

OHIO NORTHERN UNIVERSITY

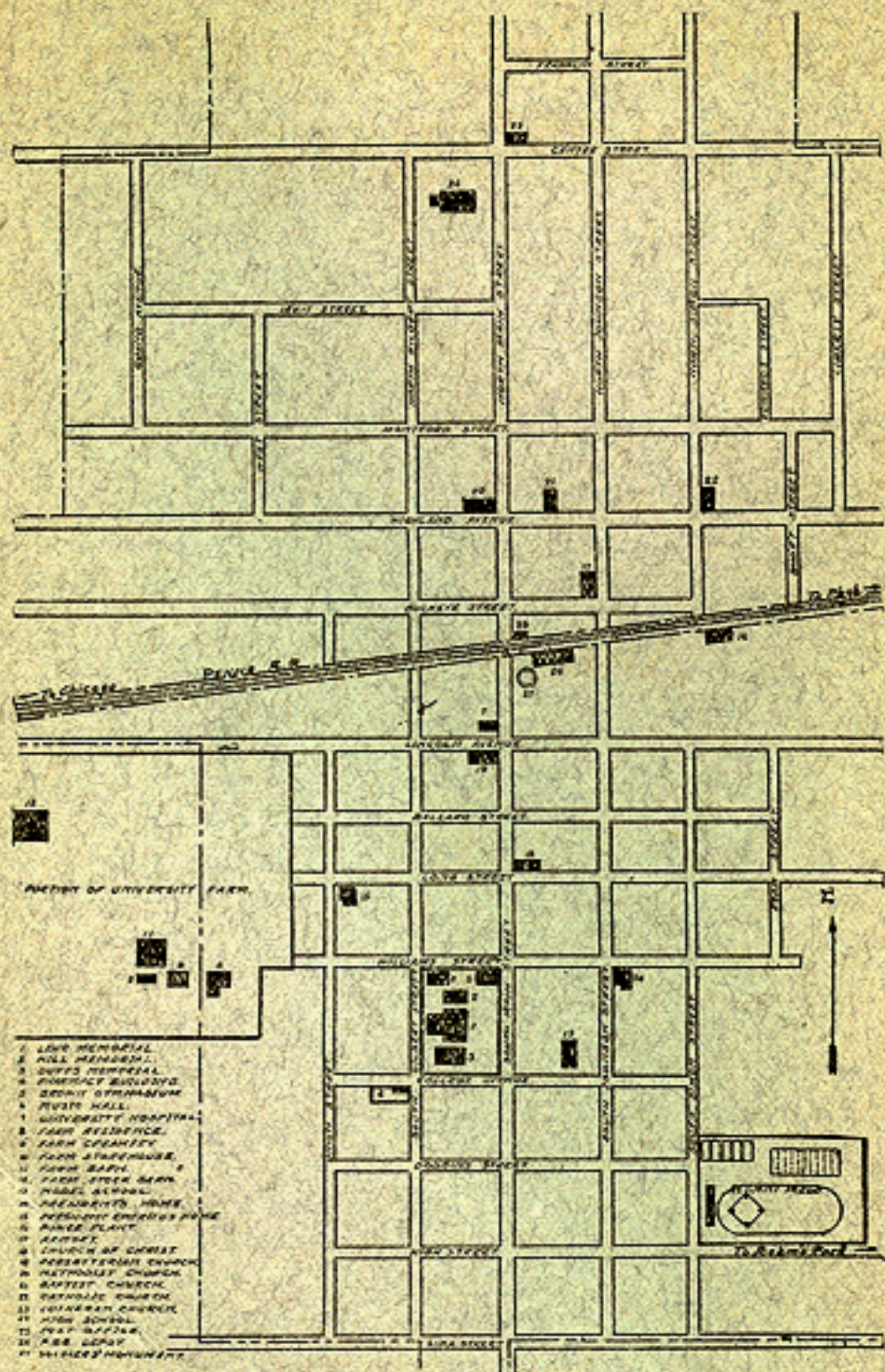
CATALOGUE



JUNE 1922

Announcement for 1922-23

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Ada and the O. N. U.

OHIO NORTHERN UNIVERSITY



Annual Catalog



June 1922

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CALENDAR

1922

FALL QUARTER

September 11, Monday-----Entrance Examinations
September 12, Tuesday-----Registration Day
September 13, Wednesday----- (8:30 A. M.) Classes begin
November 20, to November 24-----Preregistration week
November 28, Tuesday----- (5:00 P. M.) Fall Quarter Ends

WINTER QUARTER

December 4, Monday--Entrance Examinations and Registration
December 5, Tuesday----- (8:30 A. M.) Classes begin
December 15, Friday----- (5.00 P. M.) Christmas vacation for
Pharmacy students only.
December 22, Friday--- (5:00 P. M.) Christmas vacation begins

1923

January 3, Wednesday--- (7:00 A. M.) Christmas vacation ends
February 19, to February 23-----Preregistration week
March 2, Friday,-----Winter Quarter ends

SPRING QUARTER

March 5, Monday---Entrance Examination and Registration
March 6, Tuesday----- (8:30 A. M.) Classes begin
May 11, Friday-----Junior-Senior Day
May 14, to May 18-----Preregistration Week
May 20, Sunday-----Baccalaureate Day
May 21, Monday-----Class Day
May 22, Tuesday-----Alumni Day
May 22, Tuesday----- (9:30 A. M.) Annual Meeting of Board
of Trustees.
May 23, Wednesday-----Commencement Day

SUMMER QUARTER

May 28, Monday-----Entrance Examinations and Registration
May 29, Tuesday----- (8:30 A. M.) Classes begin
July 6, Friday-----First Special Summer Term Ends
July 9, Monday-----Second Special Summer Term Begins
July 30, to August 3-----Preregistration Week
August 11, Saturday-----Summer Quarter and Second Special
Summer Term Ends.

FALL QUARTER

September 10 Monday-----Entrance Examinations
September 11, Tuesday-----Registration Day
September 12, Wednesday----- (8:30 A. M.) Classes begin

OHIO NORTHERN UNIVERSITY

BOARD OF TRUSTEES

Elected by the Conference

Initus		Exitus
1899	HON. S. A. HOSKINS, A.M.	Columbus, 1921
1913	MR. JOSEPH H. EDWARDS	Leipsie, 1921
1911	MR. GEORGE E. WHITNEY	Marysville, 1921
1898	REV. D. H. BAILEY, D.D.	Kenton, 1922
1907	*MR. S. A. BOWMAN	Celina, 1922
1917	REV. C. E. SCHENK	Cincinnati, 1922
1913	REV. WILLIAM A. WIAINT, D.D.	Springfield, 1923
1913	REV. JAMES R. COLLEY, D.D.	Greenfield, 1923
1905	HON. JOHN H. CLARK, LL. B.	Marion, 1923
1914	REV. CYRUS M. VAN PELT, D.D.	Cincinnati, 1924
1918	REV. WILLIAM E. PUTT, D.D.	Cincinnati, 1924
1918	MR. EDGAR J. BROOKHART, LL. B.	Celina, 1924
1910	MR. S. D. HAZLETT	Ada, 1925
1915	MR. H. E. MEYERS	Springfield, 1925
1919	MR. W. W. MORRALL	Morrall, 1925

*Deceased

Elected by the Alumni

1918	DR. AUSTIN S. MCKITRICK	Kenton, 1923
1919	HON. JOHN F. KRAMER, LL. B.	Mansfield, 1924
1910	REV. J. WESLEY HILL, D.D., LL. D.	N. Y. City, 1925
1916	HON. FRANK B. WILLIS, LL. D.	Washington, D. C. 1926
1922	ROBINSON G. JONES, A.M., Ped. D.	Cleveland 1927

At Large, Elected by the Trustees

1911	HON. HENRY CLEWS, PH. D., LL. D.	N. Y. City
1917	DR. GEORGE FRANKLIN GETTY	Los Angeles, Calif.
1920	RALPH PARLETTE, LITT. D.	Chicago, Ill.
1920	BENJAMIN A. GRAMM, M.A.	Lima, Ohio
1920	BISHOP WILLIAM F. ANDERSON	Cincinnati, Ohio

COMMITTEES

7

Officers of the Board

S. A. HOSKINS, President.

EDGAR J. BROOKHART, Secretary-Treasurer.

Standing Committees

Agriculture: S. D. Hazlett, D. H. Bailey, S. A. Bowman, C. E. Schenk, A. E. McKittrick, E. J. Brookhart, W. E. Putt.

Buildings and Grounds: S. A. Bowman, J. H. Clark, S. D. Hazlett, Wm. A. Wiant, J. F. Kramer, H. E. Myers, W. E. Young, W. W. Morall.

Cabinet and Library: D. H. Bailey, Joseph H. Edwards, S. D. Hazlett, James R. Colley, J. F. Kramer, C. E. Schenk, W. E. Young, S. A. McKittrick, W. W. Morall.

Degrees: S. A. Hoskins, James R. Colley, J. W. Hill, George E. Whitney, W. W. Morall, W. E. Putt.

Executive: S. A. Bowman, J. W. Hill, Wm. A. Wiant, C. M. Van Pelt, A. E. Smith (ex-officio), E. J. Brookhart.

Finance: Joseph H. Edwards, S. A. Bowman, S. D. Hazlett, C. M. VanPelt, E. J. Brookhart.

Instruction: J. H. Clark, D. H. Bailey, S. A. Hoskins, A. E. Smith (ex-officio), George E. Whitney, H. E. Myers, A. E. McKittrick, W. E. Putt.

ALUMNI OFFICERS

President.....W. H. Wagers, Toledo, Ohio

Vice-President.....E. C. Akerman, Lima, Ohio

Secretary-Treasurer.....Thomas J. Smull, Ada, Ohio

Executive Committee

Mrs. A. S. McKittrick, M. L. Snyder, L. C. Slesman

Nomination Committee

William McGirr, Rudolph H. Raabe, E. A. Harper

Election Committee

Thomas J. Smull, F. L. Berger, E. E. Long

ADMINISTRATION OFFICERS AND FACULTY

- HENRY SOLOMON LEHR, Ph. D. 404 Union
President Emeritus.
A. B., Mt. Union College, 1871; A. M., 1873; Ph.D., University of
Wooster, 1897.
- ALBERT EDWIN SMITH, D.D., Ph. D. 502 South Johnson
(President on the William W. Edwards Foundation.)
President of Ohio Northern, 1905—
A. B., Wesleyan University, 1887; Ph. D., 1898; D.D. 1906.
- JOHN DAVISON, M. S., Ped. D.
Vice President and Dean of College of Education. (1916—)
B. S., Ohio Normal University, 1889; M.S., 1892; M. Lit., 1902; Ped.D.,
Ohio Northern, 1912.
- THOMAS JEFFERSON SMULL, Archt., C. E., Eng. D. 301 S. Main
Executive Secretary. (1918—)
C.E., Ohio Northern 1904; Archt., 1906.
Graduate student, Lafayette College, 1904-05; Dean of College of
Engineering 1905-1917; Eng. D. Oglethorpe University, 1921.
- MARGARET ELEANOR WHITWORTH, B. S. 219 E. Monford
Registrar. (1917—).
Entrance Examiner (1922—).
B. S., Geneva College, 1894.
- GUY LAWTON SMITH, B.S. in Ed. 502 S. Main
Treasurer and Assistant Registrar (1922—).
B. S. in Ed., Ohio Northern, 1921.
- HARVEY EVERT HUBER, A. M., 226 E. Lincoln
Professor of Biology. (1913—1917, 1919—).
Dean of College of Liberal Arts. (1920—).
A.B., Ohio Northern, 1909; A.M., Yale University, 1912; Graduate stu-
dent, University of Wisconsin, 1920.
- CARROLL RUSSELL ALDEN, E. E., M. E. 414 S. Gilbert
Professor of Electrical Engineering. (1921—)
Dean of College of Engineering. (1921—)
B.S. in E.E., Ohio Northern, 1915; B.S. in M.E., Ohio Northern, 1916;
E.E., Ohio Northern, 1917; M.E., Ohio Northern, 1918.
- WILLIAM PRICE HENDERSON, LL.B. 125 S. Gilbert
Professor of Law. (1921—)
Dean of College of Law. (1921—)
A.B., Ohio Wesleyan University, 1888.

OFFICERS AND FACULTY

9

- RUDOLPH HENRY RAABE, Ph.B., Ph.C. 316 S. Gilbert
 Professor of Pharmacy. (1911—)
 Dean of College of Pharmacy. (1917—)
 Ph.G., Ohio Northern, 1910; Ph.C., 1911.
- FRANK LEWIS BERGER, A.B., B.S., 121 E. Lehr
 Professor of Physics. (1911—)
 Director of Preparatory School, (1921—)
 A.B., Ohio Northern, 1910; B.S., University of Chicago, 1914.
- FREDERIC THOMAS KILLEEN 209 S. Johnson
 Professor of Voice and Director of A. D. Juilliard School of
 Music. (1916—)
 Graduate of University of Michigan, School of Music, 1905; Assistant in
 Voice, 1905-1907; Pupil Sig. De Macchi and Harriet Ware, New York
 City, 1907-1909.
- EMMETT ELIJAH LONG, B.C.S. 621 S. Johnson
 Bookkeeping and Penmanship. (1907—).
 Director of School of Commerce, (1918—).
 Student at Zanerian Art College, 1909. B.C.S., Ohio Northern, 1911.
- ANDREW SCOTT STAUFFER, B.S., B.S. in Agric. 610 S. Union
 Assistant Professor of Biology. (1920—)
 B.S., Ohio Northern, 1915; B.S. in Agriculture, Ohio State University,
 1918; Graduate Student University of Wisconsin, 1920; Graduate Student,
 Ohio State University, 1922.
- MATRONA ANGELO BURRIS, A.M., LL.B., Ph.D. 516 S. Main
 Professor of Religious Education and Philosophy, (1921—).
 Director of School of Religion, (1921—).
 A.B., Ohio Northern, 1903; LL.B., Ohio Northern, 1905; A.M., Harvard,
 1908; Ph.D., Harvard, 1910.
- MAE DEMING-McCOPPIN, M.O. 431 N. Gilbert
 Professor of Expression, (1887-1901; 1907—).
 Director School of Expression, (1887-1902; 1907-1912; 1917).
 B.O., Ohio Normal, 1887; M. O., Ohio Normal, 1888.
- JAMES OTTO NEWTON, D.D.S. 514 S. Union
 Professor of Physical Education, (1921—).
 Director of School of Physical Education, (1921—).
 D.D.S., Ohio State, 1904.
- RICHARD HOLMES SCHOONOVER, AM., B.D., 115 S. Johnson
 Professor of Greek and Church History. (1901—).
 A. B., Northwestern Ohio Normal School, 1884; A.M., 1887; A.B., Ohio
 Wesleyan, 1888; B.D., Drew Theological Seminary, 1889.

- MAJOR A. CLIFFE DEMING, A.M., B.O. 118 S. Johnson
 Professor of Public Speaking, (1901-1902; 1907-1917; 1920—).
 Director of School of Expression, (1912-1917).
 B.O., Ohio Normal, 1899; A.B., Ohio Normal, 1900; Graduate Emerson
 School of Oratory, 1901.
- LENIX CRAIG SLEESMAN, Ph.G., Ph.C., 702 S. Gilbert
 Professor of Chemistry. (1906—)
 Ph.G., Ohio Northern, 1905; Ph.C., 1906.
- CHILDE HAROLD FREEMAN, B.S. 317 W. University
 Professor of Rhetoric and English Literature. (1910—).
 B.S., Ohio Normal University, 1901.
- CARRIE ADEL WILSON, B.E. 534 S. Johnson
 Dean of Women.
 Professor of Education. (1914—)
 B.E., Ohio Northern 1908.
 B.E., Ohio Northern, 1908; Graduate Student, College of Education, Ohio
 State, 1912-1913.
- WALTER DAVID NISWANDER, A.M. 310 E. Lincoln
 Professor of History. (1917—)
 B.Ph., B.Ped., Ohio Northern, 1914; M. A. Ohio State University, 1917.
 Graduate Student, University of Wisconsin, 1922.
- WIGHTMAN S. BECKWITH, A.M. 718 S. Main
 Professor of Mathematics. (1918—)
 A.B., Emory College, 1909; A.M., Harvard, 1917.
- HERMAN JACOB WEBER, A.B., LL.B. 220 S. Main
 Professor of Law. (1921—)
 A.B., Heidelberg, 1912; LL.B., Western Reserve, 1915.
- ELLAHUE ANSILE HARPER, A.M., LL.B., 418 S. Johnson
 Professor of Law. (1918—)
 A.B., Ohio Normal University, 1890; B.L., Ohio Wesleyan, 1893; A.B.,
 Ohio Wesleyan, 1898; LL.B., Ohio State, 1900.
- WILFRED ELLSWORTH BINKLEY, B.S., A.B. 624 S. Gilbert
 Professor of Political Science and Economics. (1921—)
 B.S., Ohio Northern, 1907; A.B., Antioch, 1910; Graduate Student, Har-
 vard, 1910-11.
- MARTELLE ELLIOT-DAVIS, A.B., Ph.D. 424 S. Main
 Professor of Modern Languages. (1921—).
 A.B., Ohio Wesleyan; Ph.D., University of Washington.
- GUY HERBERT ELBIN 224 E. Lincoln
 Professor of Civil Engineering. (1919—)
 B.S. in C.E., Ohio Northern, 1916; C.E., Ohio Northern, 1920.

OFFICERS AND FACULTY

11

- HARRY LEE HAMPSEY, Ph.G. 316 S. Gilbert
Instructor in Pharmacognosy. (1919—).
Ph.G., Ohio Northern, 1918.
- GEORGE ANDERSON, D.D. 306 S. Main
(On the Stambaugh Estate Foundation).
Professor of Preparatory English, (1919—).
A.B., Nottingham University, 1878; Graduate English Student, London University, 1880; D.D., Royal Naval Institute, 1917.
- CLARENCE CLEVELAND CARPENTER, C.E. 820 S. Gilbert
Professor of Civil Engineering. (1920—)
B.S., in C.E., Ohio Northern, 1912; C.E., Cornell Univ. 1917.
- WALTER GRAY, A. M. 620 S. Gilbert
Professor of Psychology and Sociology. (1920—)
B.S. in Ed., Ohio Northern, 1915; A.M., Ohio State University, 1918
- IVOR ST. CLAIR CAMPBELL, M.E., E.E. 201 E. Highland
Professor of Mechanical Engineering. (1921—)
B.S. in M.E., Ohio Northern, 1916; B.S. in E.E., Ohio Northern, 1917;
M. E., Ohio Northern, 1918; E. E., Ohio Northern, 1919.
- JOHN THEODORE FAIRCHILD, Ph.M., C.E. 305 S Main
Professor of Mathematics, (1921—).
A.B., Ohio Northern, 1895; Ph.M., Carnegie Institute, 1902; C.E., Ohio Northern, 1904; Graduate Student, University of Chicago, 1921.
- JESSE RAYMOND HARROD, B.S. 213 E. University
Instructor in Chemistry, (1921—)
B.S., in Education, Ohio Northern, 1918; B.S., Ohio Northern, 1919;
Graduate Student, Ohio State, Summer, 1921, 1922.
- EUNAH JOHNSON, A.B., 308 E. Lincoln
Instructor in Mathematics. (1922—).
A.B., Miami University, 1916.
- MARY MIRIAM BLAIN, Grad. in Ped. and Com. 417 Union
Instructor in Stenography and Typewriting. (1920—).
Graduate, Gregg School of Shorthand, 1920.
- MARY CLYTICE PHILLIPS 714 S. Main
Instructor in Piano and Pipe Organ. (1917—)
Graduate in Piano, Ohio Northern, 1916; Graduate Student Chautauqua, New York, 1920.
- DOROTHY JEAN AMES 534 N. Main
Instructor in Piano.
Graduate in Piano, Ohio Northern, 1919; Student of Rudolph Reuter;
Graduate in Piano, Chicago Musical College, 1921.

- ETHEL WARREN 724 S. Main
Assistant Instructor in Piano. (1919—)
Graduate in Piano, Ohio Northern, 1917; Graduate Student, Chicago Musical College, 1921.
- CARRIE WILLIAMS BREWER 620 Union
Instructor in Violin. (1920—).
Conservatory of Music, Cincinnati, 1915.
- SIG. MICHAEL MAZZULA, B.S. in Chem. E. 214 W. Ballard
Instructor in Wind Instruments. (1920—).
B.S. in Chem. E., Ohio Northern, 1921.
- GRACE NORMAN ROSSER 219 N. Main
Assistant Professor of Physical Education. (1921—).
Graduate in Expression, Ohio Normal, 1891; Graduate Curry School of Expression, 1899; Post-Graduate Curry School of Expression, 1901.
- RALPH L. STEWART 821 S. Gilbert
Instructor in Gymnasium.
- ARTHUR MILNE, A.B.
General Secretary Y. M. C. A.
A.B., Mt. Union, 1922.
- MARY ELIZA THOMAS 424 S. Gilbert
Librarian.
B.S., Ohio Normal University, 1894.
- FLO. L. CRONBAUGH, G. Sten. 516 S. Simon
Notary Public.
Stenographer and Office Secretary.
G. Sten. Ohio Northern, 1911.
- ESTHER PATRICK, (Ohio State).
Instructor in Domestic Science.
(Summer Quarters, 1916—).
- WILLIAM H. SCHAUM 413 S. Gilbert
Assistant in Mathematics.
- CLARENCE M. CARHART 821 S. Gilbert
Assistant in Drawing.
- ERNEST V. JONES 821 S. Gilbert
Assistant in Mechanical Laboratory.
- CHARLES E. HOEL 724 S. Union
Assistant in Physical Laboratory.
- ARCHIE G. HAIR, B.S. in Chem. E. 534 S. Main
Assistant in Chemical Laboratory.
- EVERETT L. BIRD 502 S. Main
Assistant in Electrical Laboratory.
- ALVA E. ROCKWELL, Ped. B.
Farm Superintendent.
Ped. B., Ohio Normal University, 1899.

FACULTY COMMITTEES

Administration: Dr. Smith, Dr. Davison, Dr. Smull, Mrs. Whitworth.

Artist-Lecture: Dr. Smull, Professors Killeen, Blain, Fairchild, Dr. Davis.

Assignment and Supervision: The Deans and Directors, Registrar, Chairman.

Athletics: Professors Sleesman, Killeen, Long, Elbin, Niswander, Dr. Newton.

Entrance: The Deans and Directors, Entrance Examiner, Chairman.

Finance: Dr. Smith, Dr. Smull, Treasurer Smith, Mrs. Whitworth.

Fraternities: Professors Hamsher, Elbin, Beckwith, Harper, Raabe, Carpenter.

Graduation and Degrees: Deans and Directors, Registrar Chairman.

Library: Miss Thomas, Professors Gray, Freeman, Weber, Stauffer.

Life Service: Dr. Burris, Dr. Davis, Professor Wilson, Messrs. Meyer, Milne.

Literary Societies: Professors Berger, Niswander, Major Deming, Campbell, Schoonover.

Loan Fund: Dr. Smith, Treasurer Smith, Dr. Smull.

Physical Education: Dr. Newton, Professors Wilson, Sleesman, Major Deming, Treasurer Smith.

Student Publications: Professors Freeman, Stauffer, Wilson, Binkley, Dr. Smull.

Students' Welfare: Dr. Anderson, Dr. Burris, Professors Wilson, McCoppin, Gray, Harrod, Johnson.

Student Home: Dr. Burris, Dr. Davis, Miss Wilson.

Summer School: Dr. Davison, Dr. Smull, Professors Freeman, Huber, Berger.

Schedule: The Deans and Directors.

OHIO NORTHERN UNIVERSITY BULLETIN

New Series

ADA, OHIO, JUNE, 1922

Vol. XV, No. 1

Seat of Ohio Northern

Ada, the seat of the Ohio Northern University, is an attractive little city in Northwestern Ohio, on the Pittsburg, Fort Wayne & Chicago Division of the Pennsylvania Railroad, fifteen miles east of Lima and twenty-eight west of Upper Sandusky. Railroad connection is made at Lima with the Baltimore and Ohio and the Lake Erie & Western division of the New York Central Lines and the Erie Railroad. Connection is also made at Upper Sandusky with the Hocking Valley, at Forest, sixteen miles east, with the Big Four, and at Dunkirk, ten miles east, with the Ohio Central Lines.

Lying on the great watershed separating the waters tributary to the Ohio and the Mississippi from those flowing into the Great Lakes, Ada, with its population of three thousand, has an elevation above sea-level as high as any in the State, with healthful climate, sanitary conditions well guarded, and an abundant supply of excellent water from drilled wells. The town is unsurpassed in healthfulness and freedom from epidemics. Numberless forest trees line avenues and adorn premises, affording a delightful retreat during the warm summer months. The paved streets, hot and cold water plants, electric light and natural gas evidence the wide-awakeness of the citizens in the matter of public utilities and city improvements.

Historical Sketch

On August 14, 1871, in a three-story brick building erected in the campus where the Lehr Memorial now stands, the Northwestern Ohio Normal School, with Henry Solomon Lehr at its head was formally opened "for the instruction and training of teachers in the science of education, the art of teaching and the best methods of governing schools."

The name was changed to Ohio Normal University and a charter from the State issued on May 19, 1885, the policy and management remaining the same as before.

The school was under private control from the outset until September, 1898, when the owners sold to the Central Ohio (now the West Ohio) Conference of the Methodist Episcopal Church the real estate, personal property and equipment belonging to the school. Under the new administration, as fast as existing contracts permitted, the departments, heretofore semi-independent, were recognized under one management, and the respective heads, designated deans, were placed on salary instead of commission. At the same time instruction in the main school was made departmental, with the head teacher in each department director thereof. The new charter was dated May 24, 1889.

In 1904 the institution was re-named Ohio Northern University, and the charter amended December 31, 1907.

In the spring of 1910 the Trustees recognized the College of Liberal Arts as distinct from the Normal School, and appointed a dean in charge. The courses leading to the scholastic degrees were strengthened, the standard number of hours required for the bachelor degrees adopted, and the conferring of the Master's degree discontinued until such time as the resources of the institution should permit organization for post-graduate instruction.

Ohio Northern's Mission

The Ohio Northern University invites to her privileges all worthy young men and women, especially the self-dependent, who are ambitious for a liberal education. Her entire regime has in view the creation and maintenance of an atmosphere inspirational and congenial to plucky young people of both sexes whose lot in life has taught them the worth of hard labor and close economy. Jeans and broadcloth, homespun and silk have equal chance. The atmosphere is thoroughly democratic, a leading characteristic being the spirit of good fellowship existing among the students, a majority of whom are relying mainly on their own pluck and push. Thorough and practical instruction in all the departments is provided at a minimum expense to the student.

Unique Features

The school year is forty-eight weeks in length, divided into

four terms, designated, respectively, Fall, Winter, Spring and Summer Quarters. Instead of measuring time and work by Freshman, Sophomore, Junior and Senior years, credit is based on number of hours of class work done in each subject. At the beginning of the Winter Quarter the Junior and Senior classes are formally organized under the direction of a member of the faculty. Those having at least 90 quarter hours and 100 points are admitted to the Junior organization; those having at least 135 quarter hours and 135 points are admitted to the Senior organization. The student must present a certificate from the registrar.

Students enter at the beginning of any quarter (except in Pharmacy), find their places where certificates or examination credits rank them, pursue studies as many terms as their plans and means allow, and are duly credited on the records with the work done. On satisfactorily completing the required number of hours in the selected curriculum the appropriate degree is granted, the diploma bearing the date of Commencement Day of the year in which the work is finished.

General Directions

Any one intending to enter the University and desiring to arrange matters beforehand will address, "The University, Ada, Ohio."

A satisfactory assignment to classes can best be made at the beginning of the Fall quarter; however, students are admitted at the opening of any term.

The applicant for a degree, coming from another college, is required to spend at least thirty-six weeks in residence.

On arrival the newcomer is expected to report at once at the University office to receive needed information regarding lodging places and boarding houses, also obtain a card of matriculation and arrange his work.

Requests for Credits

To insure prompt attention, requests for credits, certificates of graduation, class standing, recommendations, et cetera, should be accompanied by a stamped self-addressed envelope.

Each student is entitled to one copy of his credits; 50 cents is charged for each additional copy.

EQUIPMENT

Location and Buildings

The **Campus** lies in a resident portion of the village, a few blocks south of the Pennsylvania Station.

On the campus stand four memorial buildings: On the south side, the **Dukes Memorial** with commodious classrooms, offices and laboratories, devoted to science, mathematics and engineering; in the center, the **Lehr Memorial**, in which are located the executive offices, the Y. M. and Y. W. C. A. rooms, the library and reading rooms, the apartments of Law and Commerce departments and a magnificent auditorium for chapel and other public meetings; to the north, the **Hill Memorial**, devoted to language, history, philosophy and education; in this building are the mechanical and electrical laboratories and the attractive halls of the Franklin and Philomathean literary societies.

In the northeast angle of the campus is located **Brown Memorial**, fitted and equipped for gymnasium and used as an assembly hall for social functions. Recently a wing has been added, with equipment and special appliances for instruction in Domestic Science. The University Cafeteria is located in the basement.

Pharmacy Hall, in the northwest angle, especially arranged and equipped for the College of Pharmacy, contains also the spacious assembly room of the Adelphean literary society.

Just outside, southwest of the quadrangle, is **Music Hall** with assembly room, offices and private practice rooms.

An experimental **Greenhouse** of ample size has been erected recently.

A modern **Power Plant** is under construction.

Laboratories and Museum

The **Biological Laboratories**, located on the second floor of Dukes Memorial, are well lighted and equipped with water, gas and electricity. The department makes use of a lantern to illustrate lectures and other phases of the work. In the laboratories is found an ample supply of reagents, stains and glassware, also oil-immersion lens, dissecting microscopes, cam-

era lucida, micrometer eye-pieces, a large rotary microtome, hand microtome, paraffin bath, microscopic slides, models, charts, and preserved materials for study—enough material and apparatus to do modern work in the courses offered.

The greenhouse before mentioned offers facilities for many phases of class work and laboratory practice in Biology, Horticulture and Pharmaceutical Botany. An aquarium also furnishes much material for study.

The University was recently the recipient of a modern X-ray machine from Dr. A. S. McKitrick, of the McKitrick hospital, Kenton, Ohio. The machine is of the type used for all kinds of biological and hospital X-ray work. This piece of apparatus will be especially valuable to pre-medical students and others in the science departments.

Dr. McKitrick, the donor, is an alumnus of the institution, and also a member of the Board of Trustees.

The Chemical and Physical Laboratories are large, well-lighted, and equipped with natural gas and alternating and direct current. In the general chemical laboratory are one hundred and twelve lockers with first-class outfits, including all apparatus necessary for thorough individual work. A modern equipped Volumetric laboratory with individual lockers has been installed recently. The physical laboratory has ample accommodation for more than one hundred and fifty students, with apparatus for experimentation both in preparatory and college Sophomore physics.

The Pharmaceutical and Dispensing Laboratories, occupying the entire basement of Pharmacy Hall, are supplied with modern apparatus and desk arrangements; the equipment affording every facility for thorough individual work in practical chemistry and the various pharmaceutical preparations. The equipment includes a complete outfit for gold and silver assaying and other metallurgical work. In the "specimen room" is an interesting exhibit of all the crude drugs of *materia medica*, a complete line of U. S. P. chemicals, a fine case of salts and alkaloids, and another of biological specimens, such as serums, antitoxins, and the like. On the first floor a well-lighted microscopical laboratory is supplied with an outfit of

compound microscopes, accessories and appliances for special work in pharmacaal micro-technique.

Civil, Mechanical and Electrical Laboratories are described under the caption, "College of Engineering."

The Museum contains numerous specimens and collections for illustrating geology and the biological sciences. In the geological alcove are found many of the common minerals and ores, many rare ones, meteorites, plant and animal fossils representing several of the chief orders of geological importance, the shells and skeletons of many living molluscs and vertebrates. The zoological alcove exhibits about 200 birds, representing one or both sexes of nearly all of those common to this region, all animals, native to Ohio, many kinds of snakes, and several hundred specimens, of the orders of invertebrates preserved in jars. For illustrations in anatomy a human skeleton and structural models of various organs are at hand.

Recently, through good will and generosity there has come into the possession of Ohio Northern a private collection of rare and valuable geological specoimens, the result of years of enthusiastic study and research on the part of the donor, Mr. E. R. Webber, of Kenton, Ohio. "May his tribe increase!"

Library

In the disastrous fire of 1913 the University lost its library. In its stead there is being established by purchase and gift a new and better one, in apartments built for the purpose, on the second floor of Lehr Memorial. Here in spacious and well-lighted quarters have been provided a reading room accommo-dating one hundred and fifty students, and a stack room with capacity for 60,000 volumes. To the south, on the same floor, is located the Law Department with a legal reference library of some 2000 volumes.

The University makes definite provision for the building up of the library, but, since books are costly and anything like an adequate equipment means a large investment of money, all the friends of the institution are earnestly invited to assist by making donations of up-to-date books and by generously contributing funds. The departments of history, literature, sociology, economics and philosophy especially suffered from the

fire. Any contribution of libraries and single volumes practically serviceable in these and the other fields of learning will be gratefully received and acknowledged. Those desiring to make donations and not knowing just what would meet the need, kindly communicate with the heads of departments concerning the matter. A sum of \$3000 is set aside annually by the University to augment contributions.

Athletic Field

Within a block and a half of the Campus, lie the Athletic Grounds, owned and controlled by the University, on whose area of several acres the Baseball Diamond, the Football Gridiron, the Running Track, and the Lawn Tennis Courts are located.

University Farm

The University possesses a tract of land, well equipped with buildings and modern equipment within a block and a half of the Campus, containing ninety acres of rich, productive soil under cultivation, devoted to the practical demonstration of farm products and problems.

President's Home

By action of the Board of Trustees a desirable property a square from the Campus has been purchased as a residence for the President of the University.

STUDENT SOCIETIES AND ACTIVITIES

Literary Societies. Three Literary Societies, chartered, and meeting in furnished assembly rooms, are maintained by the students exclusively—the Franklin, Philomathean and Adelphean.

Under the supervision of the societies, clubs are organized each term for practice in debate, extempore speaking, and parliamentary law.

The Ohio Northern Debating Association, a student organization, arranges for and engages in forensic contests between Ohio Northern and other institutions. Membership is

open to any student interested in the object of the association, irrespective of department. A certain per cent of the Student Activity fee is appropriated to the maintenance of forensic work. Debators are selected and assisted in their training by a faculty committee. As a mark of distinction the University letter is awarded to those participating in intercollegiate contests.

Christian Associations. The Young Men's and Young Women's Christian Associations have enthusiastic organizations in the University and wield a most wholesome influence on the lives and habits of the students.

The Young Women's Christian Association has a membership including about ninety per cent, of all the young women in attendance at the school.

A devotional meeting open to all the University women is held weekly. At the beginning of each quarter Bible and Mission Study classes are organized under efficient teachers.

Both Y. M. C. A. and Y. W. C. A. Bible Study classes and religious meetings are open respectively to all men and women enrolled in the University.

Moral and Religious Culture

Much attention is given to awakening and fostering an aspiration to attain to the highest type of Christian manhood and womanhood.

While the University is the property of the West Ohio Conference of the Methodist Episcopal Church and is denominational in its ownership and control, it is in no sense sectarian. Students of all religious denominations are received on equal terms and treated with equal consideration. They are urged to identify themselves with the work and participate regularly in the services of the church of their choice. The six churches of the city cordially welcome students to their religious and social meetings and Bible classes.

The department of Philosophy and Religious Education mentioned elsewhere gives opportunity to those who wish to take up the study of religious problems to fit themselves for life's work.

Musical Organizations

Choral Society. The Choral Society is made up of both university students and townspeople and is open to all who love good music. The society meets every Monday evening that school is in session during the first three quarters. The fees charged are nominal. The society aims to give two public performances each year.

Men's Glee Club. A glee club of twenty voices has been organized, for the purpose of giving home concerts and touring the state each year.

Girls' Glee Club. This club is organized to learn the best in choral works written for female voices, and to give concerts each year.

Orchestra. A large orchestra is being organized to take up standard works of the great composers, and to play at the concerts of the Choral Society.

Band. A splendid band is maintained, affording an opportunity for practice to students playing brass or reed instruments.

Publications

The "Annual" is a sumptuous serio-comic volume published by each out-going class, and is always awaited with eagerness and treasured as a souvenir of college days.

"The Northern Review" is the college paper. It is published during the regular college year by the students of the University.

Athletics

College teams in baseball, football, basketball and track athletics are maintained. Interdepartmental, inter-class and intersociety sports are also encouraged.

The department of Athletics is managed by a Board of Directors, comprised of the Faculty Committee on Athletics (appointed by the President of the University), the Athletic Director, and a student member for each college sport; the student members being elected by the Athletic Association, a

student organization, to which any student of the University may belong.

Ohio Northern became a member of "Ohio Conference," better known as the "Big Six" of Ohio, on October 13, 1916.

A fee of \$1.00 per quarter is charged for use of gymnasium including locker and bath. Upon payment of tuition, the student receives a ticket of admission to all intercollegiate athletic events.

Lectures and Concerts

An excellent series of lectures and concerts is given each year. The best talent, both in the lecture field and musical world is brought before the student body.

Technical and Social Organizations

The following technical organizations have regular meetings:

The American Institute of Electrical Engineers.

The American Association of Engineers.

The American Society of Mechanical Engineers.

The Chemical Engineering Society.

The Pharmaceutical Association.

The Law Association, the Educational Association, the Commercial Club, State Clubs, and the Pre-medical Association also have their regular meetings. Topics pertaining to the several departments are discussed, and addresses are given by people prominent in their respective lines of work.

Assemblies

Convocations are held each school day except Monday, from 8:00 to 8:30 a. m. The aim of which is not only to recognize the duty and privilege of daily devotions, but to foster a university spirit by bringing together into one assembly the students of the several departments to listen to practical addresses and talks from members of the faculty and others, and to be entertained by those connected with the departments of Music and Expression. Attendance is compulsory. One-fifth credit hour demerit for each absence above five.

At the public functions of Commencement week, members of the faculty and of the graduating class wear academic costume in keeping with their degrees. The University colors are orange and black.

Room, Board and Home Comforts

In order to insure good wholesome food and plenty of it at the very least possible cost to the student, the University has recently installed a large, well equipped Cafeteria in the Brown Building. This is very much more than "an eating place". With beautiful furnishings and home comforts, this is truly a happy campus "Community center". It is open to the public.

Good board in private homes, \$3.50 to \$4.50 per week.

Meal tickets at restaurant, \$4.50 to \$5.00 per week.

Ada is strictly a school town. The citizens throw open their homes to the students. They have long been noted for their hospitality. Since a majority of the families are engaged in rooming students, the competition is sharp and prices are low. Rooms vary from \$1.50 to \$2.50 per week according to location and appointments.

EXPENSES

Matriculation

No matriculation or entrance fee is required to enter the University. Some schools advertise free tuition, but it will be found that entrance fees with them amount to more than tuition fees here, a fact not to be overlooked by those selecting a school thorough, yet less expensive.

All fees such as Matriculation, Registration, Library, Student Activity, etc., are included in tuition charges except a small maintenance fee in laboratory and field work, also a locker fee in Physical Education.

Tuition Rates

In the Departments of Liberal Arts, Education, Engineering, Commerce, Agriculture, and Preparatory School, tuition rates are as follows:

For one quarter, (12 weeks), in advance-----	\$ 34.00
For two quarters, in advance-----	67.00
For three quarters, in advance-----	100.00

In the College of Law:

For one quarter (12 weeks), in advance-----	\$ 38.00
For two quarters, in advance-----	75.00
For three quarters, in advance-----	109.00

In the College of Pharmacy:

Tuition for 32 weeks, including drugs, chemicals and laboratory fee, in advance-----	\$125.00
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In the College of Music, School of Expression, and School of Fine Arts:

Tuition rates in detail given in the description of the respective departments.

All students paying the regular tuition fee are admitted to the general classes in Rudimental Music without extra charge.

The tuition rates for the Summer quarter in the College of Education, are \$25.00 for the 12 weeks, or \$14.00 for 6 weeks.

Laboratory Fees

Fees to cover cost of chemicals and other materials used in the laboratories are charged each term as follows:

Preparatory and College

Inorganic Chemistry I, II, and III, per quarter, \$4.00; all others, \$5.00. Preparatory Physics, \$2.50; College Physics, \$3.00. Biology, Botany and Zoology, each \$2.50. Physiology, \$1.00. Preparatory Botany, \$1.00. Domestic Science, \$8.00. Horticulture, \$2.50. Agriculture, \$1.50. Engineering, Plane Surveying, Field Engineering, Railroad Engineering, each \$2.50; Mechanical Engineering, \$3.00; Electrical, \$4.00; Electrical IX, \$7.00; Machine Shop, \$2.00; Testing of Materials, \$3.00; Gymnasium (including locker fee), \$2.00.

Special Fees—Bookkeeping and Stenography

A fee of \$5.00 is charged on entering the Office Practice and Banking Classes for use of ledgers, commercial paper and other supplies.

A fee of \$4.00 is charged for use of typewriter twelve weeks, one hour a day; two hours per day, twelve weeks, \$7.00. A fee of \$10 is charged for use of post-machine and calculator per quarter. All who pay the above fees are entitled to free use of the Burroughs Adding Machine. Others are charged \$1.00.

Graduation Fees

Neatly executed diplomas are awarded to those who complete any regular course of study. The diploma fee is \$5.00 for paper, \$6.00 for vellum and \$7.00 for parchment.

Refunding

In case of withdrawal from college, or change of course, within two days of registration, \$1.00 will be charged. After two days, refunds will be made on the following basis: Before the end of two weeks, 80%; before the end of four weeks, 60%; before the end of six weeks, 40%; after the sixth week no refund of fees will be made. Receipts are not transferable.

Failure to Preregister

Students failing to preregister will be penalized \$1.00 upon their next registration unless more than two quarters intervene. This does not apply to new registrants.

AID TO STUDENTS

Loan Fund. The Board of Education of the Methodist Episcopal Church lends money to members of that church taking a regular course in school, who have been in attendance long enough to merit a recommendation from the Faculty. No interest is charged if the debt is paid within five years from the time of leaving school, but a payment of \$5.00 each year must be made on the principal, after the applicant quits school. The only security required is a recommendation from a quarterly conference. Loans are made at the beginning of each quarter. Application should be made two weeks before the opening of the quarter and no applicant can be received later than the close of the first week of the quarter. The maximum amount allowed to each applicant is \$100 a year. An applicant must have been in attendance at least one quarter.

Scholarships. The University has received through generous donors six scholarships of \$1000.00 each, the income of

which, amounting to \$50 to \$60 per year, is to be devoted to the assistance of worthy students. The recipients of these incomes may be chosen by the donors and when not so chosen, shall be selected by the President and the Faculty of the University, and must have been in attendance at least one term before receiving aid. The scholarships are as follows:

1. The J. T. Cunningham Scholarship, M. E. Cunningham, Mrs. L. A. Cunningham, and George T. McCoppin, Ada, Ohio.

2. The George Franklin Getty Scholarship, by George F. Getty, Los Angeles, Calif.

3. The James E. and Caroline Purvis Scholarship, by James S. Purvis, Bremen, Ohio.

4. The Parlette Scholarship, by Ralph Parlette of Chicago, Illinois.

5. The Pleasant Hill Society of the Roundhead Circuit of the Methodist Episcopal Church.

6. The Stambaugh Scholarship of \$100 per year, by Mrs. Avanell Stambaugh of Ada, Ohio.

Prizes. Through the President of the University, prizes of \$15 and \$10 are awarded to winners in an annual oratorical contest among the three Literary Societies.

Miss Pearl A. M. Stahl offers \$15 and \$10 prizes annually to the two successful members of the Philomathean Society.

Dr. George W. Crile, of Cleveland, an alumnus, has permanently provided for \$15 and \$10 prizes for the winners in the Adelphean Literary Society.

Mr. George F. Getty, '79, offers \$15 and \$10 prizes annually to the members of the Philomathean Literary Society winning honors in debate.

Hon. Homer A. Ramey, '16, Toledo, Ohio, \$15.00 and \$10.00 prizes annually to the members of the Philomathean Literary Society winning honors in debate.

Hon. S. A. Hoskins, Columbus, O., \$15.00 and \$10.00 prizes to the members of the Franklin Literary Society winning honors in debate.

Mr. G. Frederick Pfeiffer of Akron, Ohio., gives \$25 a year to the engineer making the most quality points.

Mrs. Caroline Ames of Ada, Ohio, gives \$25 a year for five years for winners in the college song contest.

Mrs. Avaneil Stambaugh of Ada, Ohio, gives \$20 a year for five years for winners in the song contest.

Work. Many students in the University earn a part of their expenses by working as waiters and janitors, and at other occupations in the town and vicinity.

ADMISSION AND ENTRANCE

Only men and women of good moral character are admitted to the University. Students submitting transcripts from other schools must furnish evidence of honorable dismissal from the same.

Fifteen units of High School work are required for entrance to any of the colleges of the University. These units must be properly distributed. Units will be accepted from first grade High Schools, Academies, or Preparatory Schools. The acceptance of work from schools of lower rank will be determined by the entrance committee. (See individual College Section for proper distribution of units).

Entrance examinations will be given the first day of each quarter to those who make advanced application for the same. (See Calendar for dates).

Mature students not working for a degree may be admitted to the University providing they present their reasons for desiring this kind of work and show that they are qualified to pursue the subjects desired. Under no circumstances can such students become candidates for a degree. They are classed as "Special Students."

The official forms for certificates of entrance which may be had on application to the entrance examiner, should be used in all cases, in order to insure the presentation of necessary information.

The credited statement of entrance credits which should be sent by the Principal of the school directly to the University, must be in the Registrar's office ten days prior to the opening of the quarter to avoid delay in registration.

Only a provisional registration will be made with absence of these credits. If they are not forthcoming within three weeks, the student will be suspended from classes until entrance credits are in the hands of the Entrance Examiner.

Registration

The registration days for each quarter are indicated in the Calendar (see page 2). Failure to register on these days will subject the delinquent to the following "Cuts for Class Absence." One-fifth ($1/5$) credit hour for each subject each day first week, and two credit hours for each week's absence thereafter.

The first duty of the new student is to matriculate.

After matriculation, (and also at the beginning of each quarter,) the student is given a registration card, which he carries to the Dean of his department. The Dean advises and directs what subjects are to be pursued during the quarter and indicates these, together with his approval, on the registration card. The student then presents the registration card to the Treasurer of the University, pays the required fees, and is given a receipt which becomes a ticket of admission to the classes named thereon.

The Deans will be in their offices on Monday and Tuesday to advise students concerning their work for the quarter.

Discipline

The opportunities and advantages of the University are offered to all sincerely desiring to develop the best in themselves, and aiming at a broad culture and a thorough preparation for useful service.

Self-government is made the key-note in discipline. All are treated as ladies and gentlemen until they prove themselves otherwise. Incurable and morally corrupt persons are summarily dismissed from the institution. Every possible help is afforded in the formation of right habits, but those who cannot govern themselves are not wanted.

Regular attendance upon class work, prompt response to duty, and thoroughness in all assigned tasks are insisted on, not more for their bearing on scholarship than for their effect upon conduct and life.

The following rules on absences from class exercises are strictly enforced.

Each student is required to attend every session of the classes in which he is registered. All absences shall be reported to the instructor upon a regular form furnished by the registrar. This report shall give class, date, and reason for absence and must be submitted to the instructor immediately after the occurrence of the absence. Failure on the part of the student to secure and submit such form, automatically debars him from consideration by the Committee.

Five absences are allowed from Chapel attendance, after which this rule become effective.

Final action on this report will be taken by the "Attendance Committee" of which the registrar shall be chairman. The committee may or may not grant an excuse for such absence. **Unexcused absences reduce the college credits one-fifth of an hour for each absence.**

Unexcused absences during the two days preceding or the two days following a holiday will count double.

The "Attendance Committee," or the instructor, is empowered to exclude from a course any student whom they may consider to have been absent so often as to seriously impair his class standing. Any student so excluded will be given a mark of F.

Any student affiliating himself or herself with any organization not having Faculty or Trustee sanction will be summarily dismissed.

Dropping or Changing a Course

In case a student desires to drop or change a course, it must be done within seven days after registration in any quarter, and with the consent of his dean or director and professors concerned.

MARKS AND EXAMINATIONS

The credit value of a course is expressed in hours, an hour of credit being given for the satisfactory completion of work requiring one class exercise a week for one quarter. It is equivalent to two-thirds of a semester-hour.

Grade Marks. Ex. excellent; G. good; Av. average; P. passing; Cn. conditioned; F. failure.

Cn. means that the grade has been withheld because the work of the course has not been completed.

F. means that the student receives no credit whatever for the course, and it must be taken again.

Ex. means that "a student has grasped the subject of a course and, by thinking about it and reacting upon it, has made it his own; it represents industry and thoroughness, as well as natural ability and individual insight."

G. means that "a student has intelligently fulfilled the requirements for a course, but without showing decided ability and individual insight in reacting upon the subject so as to call it entirely his own."

Av. means "fair work, either steady work of a mediocre quality, or work of a higher quality which is uneven, irregular or fragmentary."

P. means that the student's work is "barely passing."

All grades of Cn. must be removed by examination during the next quarter of residence. Otherwise the grade becomes F.

All subjects in which a grade of F is made must be taken again the first quarter in which the subject is given after the grade was made.

Examinations. Mid-term examinations are held at the discretion of each professor. Final examinations are held as indicated in the calendar.

In order to graduate in any course the student must have one (1) quality point for every credit hour.

Points are based on the credit marks, as follows: Each hour of Ex. counts 3 points; of G., 2 points; of Av., 1 point; of P., 0 point; of Cn., -2 points; of F., -3 points.

A student making marks of F or Cn in more than one-half of his assigned work for any quarter will be denied future registration except he first petitions the faculty and gains their consent to future registration.

DEGREES

The work of the University is entirely undergraduate.

The Bachelor's degree is given in all of the 180 hour courses of the University, except Law (135 hours).

A diploma is given in the two-year courses in Education, Commerce, Pharmacy, Music and Expression.

Certificates are issued in the Preparatory School, and in one year courses in the School of Commerce and Expression.

ORGANIZATION

1. The College of Liberal Arts.
2. The College of Education.
3. The College of Engineering.
4. The College of Law.
5. The College of Pharmacy.
6. The A. D. Juilliard School of Music.
7. The School of Commerce.
8. The School of Agriculture.
9. The School of Expression.
10. The Preparatory School.
11. The School of Physical Education.
12. The School of Religion.

Faculty Meetings

General faculty meetings are held on Tuesday of the second and seventh weeks of each quarter. Time, 3:00 p. m.

Departmental faculty meetings are held on Tuesday of the fourth and ninth weeks of each quarter. Time, 3:00 p. m.

COLLEGE
OF
LIBERAL ARTS

HARVEY EVERT HUBER, DEAN

ADMISSION TO COLLEGE OF LIBERAL ARTS

Candidates of good moral character may apply for admission upon the following plans:

1. **By certificate.** Graduates from first grade high schools or accredited academies whose credits show proper distribution of units are admitted, without examination, on presentation of properly signed entrance certificates. These certificates must be made out and signed by the proper official of the school from which the applicant comes, and show in detail (1) the text book used in each subject, (2) the amount of work completed, (3) the number of weeks spent thereon, (4) the length in minutes of the recitation period, and (5) the mark or grade secured. Blanks for this purpose may be had by addressing "The University Entrance Examiner." This entrance certificate should reach the Registrar's office at least ten days before the time when student expects to enter. Candidates for admission are strongly urged to attend to this matter as early as possible.

2. **By Examination.** Candidates who are not graduates of first grade high schools or academies and are therefore deficient in some of the units for admission may be admitted upon examination. Applicants must notify the Entrance Examiner in advance so that arrangements may be made to hold examinations on first day of registration.

3. **On Advanced Standing.** An applicant from another college, seeking for advanced standing must present (1) evidence of honorable dismissal, (2) a full record of the applicant's preparation for college, (3) a transcript of his college record, subject by subject, with the grade obtained in each and the hours credited. He should submit a catalogue of his college, bearing his name and of the issue current at the time of his admission to that college.

Advance credit will not be given for more than 135 quarter hours (90 semester hours).

4. **As Special Student.** Those persons not desiring to earn a degree may enter any department and pursue the studies they choose, if, on consultation, the head of the department is satisfied that they have sufficient preparation to pursue the

work successfully. Such applicants are classified as "Special Students."

Entrance Requirements

Fifteen units are required for unconditional entrance to the college. Students with fourteen units are admitted on condition that the deficient unit be made up during the first four quarters of residence. No student is admitted to Freshman rank with less than fourteen units. The deficient unit may be removed by taking courses in the Preparatory School of the Ohio Northern University, by examination, or by substituting certain Freshman collegiate courses. During the Summer quarter the student has splendid opportunity for removing the deficiency in entrance.

Distribution of Entrance Units

Fifteen units distributed as indicated below are required for entrance, and no student is admitted to Freshman rank who does not present at least fourteen units.

1. The following 9 units are prescribed for all.

English, 3	Mathematics, 2
Foreign language, 2 (which must be in one subject).	History, 1
	Science, 1

2. At least 4 additional units must be selected from the following subjects, the number indicating the maximum number of units that will be accepted in any subject:

English, 4	Physics, 1
Greek, 3	Chemistry, 1
Latin, 4	Phys. Geog., 1
French, 3	Botany, 1
German, 4	Zoology, 1
Spanish, 3	Physiology, 1
History and Civics, 4	Agriculture, 1
Mathematics, 3	General Science, 1

3. Not more than two units may be presented from the following subjects:

Mechanical Drawing, 1	Manual Training or
Freehand Drawing, 1	Shop Work, 1
Domestic Science, 1	Commercial Law, 1
Stenography (if a full unit) 1	Commercial Geography, 1

4. The Entrance Committee, consulting with the department concerned, may consider the acceptance of:

Astronomy, $\frac{1}{2}$

Psychology, $\frac{1}{2}$

Bible, $\frac{1}{2}$

Sociology, $\frac{1}{2}$

Economics, $\frac{1}{2}$

5. The certified statement of entrance credits must be in the Registrar's office ten days prior to opening of Quarter to avoid delay in registration. The student will be subject to suspension from classes if entrance credits are not in the registrar's office within three weeks after registration.

Excess Entrance Credits

Candidates who present sixteen or more units may, at the option of the Entrance Examiner, receive advance credit for certain courses on the basis of eight quarter hours for one high school unit. Credit in foreign language may be obtained only when student offers for entrance more than four units of foreign language. Applicants for excess credit must show exceptional ability in college courses during the first two quarters of residence. The credit must be secured during the third quarter of residence in the University.

Advisers

On his admission to college rank each student is placed in charge of an adviser. This adviser, a member of the faculty, is appointed by the dean of the College in which the student is enrolled.

The duty of the adviser is to counsel the student in regard to the planning of courses, the selection of studies, and to aid him in the problems of his college life and work.

This adviser retains oversight over the student assigned to him, until the student has finished 90 quarter hours of work. At the end of 90 quarter hours the student should elect the department in which he desires to complete his major work, and the professor in charge of that department then becomes his adviser.

COLLEGIATE COURSES

The regular courses of instruction offered in the College of Liberal Arts are classified in the following departments:

Agriculture	Latin
Biology	Mathematics
Chemistry	Modern Languages
Education	Philosophy and Religious Education
English	Physics
Greek	Psychology and Sociology
History	Political Science and Economics

From the courses offered in the departments named above, schedules are arranged, consisting of prescribed and elective courses leading to the degrees of A. B. and B. S.

To aid the student in planning major and minor courses, the following grouping is set forth:

DIVISION A

Group I.	Group V.
Major: Bible and Christian Religion	Major: Latin Language and Literature
Minors: Psychology Philosophy	Minors: Greek, Modern Language European History
Group II.	Group VI.
Major: Economics and Sociology	Major: Modern Language and Literature
Minors: Political Science, History, Psychology, Biology	Minors: Ancient or Modern Language, History
Group III.	Group VII.
Major: English Language and Literature	Major: Philosophy and Sociology
Minors: English History Latin or French	Minors: Bible and Christian Religion, Education
Group IV.	Group VIII.
Major: History	Major: Political Science
Minors: Economics, English Political Science	Minors: Economics, Education, History

DIVISION B

Group IX.	Group XI.
Major: Biology	Major: Mathematics
Minors: Chemistry, Physics, Sociology	Minors: Physics, Astronomy
Group X.	Group XII.
Major: Chemistry	Major: Physics
Minors: Physics, Biology Mathematics	Minors: Chemistry, Mathematics

Credits for the following are required of all candidates for degrees:

English	18	Sociology	9
Foreign Language	15	English Bible	9
History	9	Biology 9 or Physics	12
Science	9 to 12	Mathematics 14 or Foreign	
Psychology	9	Language	12
Political Science	9		

Courses Open to Freshman

Biology 1, 2, 3, 7, 8, 9.	Greek 1, 2, 3.
Chemistry 1, 2, 3.	German 5, 6, 7, (if two units have been presented as entrance credits.)
Physics 12.	French 5, 6, 7, (if two units have been presented as entrance credits.)
English 1, 2, 21.	Economics 10, 11, 12.
History 1, 2, 3.	
Mathematics 1, 2, 3, 4, 5.	
Latin 5, 6, 7 (if four units have been presented as entrance credits.)	

Schedule of Prescribed Courses

The following is the schedule of the prescribed courses arranged by years and quarters (Fall, Winter, Spring).

First Year

English 1, 2, 21.	History 1, 2, 3.
Science (Physical or Biological)	Foreign Language

Second Year

English 3, 23, 11 or English 6, 7, 11.	Psychology 1, 2, 3.
Biology 1, 2, 3 or Physics 9, 10, 11.	Political Science 1, 2, 3.

Third Year

Sociology 1, 2, 3.	Bible 1, 2, 3.
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Fourth Year

Courses elective. By continuing in residence during the Summer quarters the entire college course may be completed in three years. Many of the Summer quarter courses are electives.

Majors and Minors

The candidate for a degree must complete in a logical sequence a major of not less than 27 quarter-hours and a minor of not less than 18 quarter-hours, to be selected from a group

in one division; and an orderly sequence of at least 15 quarter-hours in the other division (this constitutes the second minor). In addition to the required courses and the major and minor courses, the student may select, with advice, enough free electives from either or both divisions to bring total up to 180 quarter-hours.

First year courses in Foreign Languages, English 1 and 2 and History 1, 2 and 3 may not be counted toward a major.

GENERAL REGULATIONS

1. The credit value of a course is expressed in hours, an hour of credit being given for the satisfactory completion of work requiring one class exercise a week for one quarter. It is equivalent to two-thirds of a semester-hour.

2. The student may not register for more than sixteen hours of work unless he has received a credit of G. or better in all work of the preceding quarter. The student is advised to carry not more than 18 hours. If the previous record of a student shows that he is able, his Dean may grant extra hours, an honor course, provided the student petitions the faculty committee and gains their consent.

3. No student will receive credit for a subject taken in a class in which he has not been duly registered.

4. The student is held responsible for the work scheduled on the registration card. No course may be dropped or changed except by consent of the Dean and the instructors concerned. Withdrawal from a course without permission shall be checked as a failure in the course.

5. All courses that are conditioned or failed must be successfully completed according to rules in general section of catalogue.

6. Any student wishing to withdraw from this College must notify the Dean and Registrar of his intentions. Failure to do this will jeopardize the standing of the student.

7. No student may be a candidate for a degree who has not been in residence at least three quarters.

8. Mid-term examinations are held at the discretion of each instructor. Final examinations are held during the last week

of each quarter as indicated in the calendar. Unexcused absence from any regular examination shall be construed as a failure.

9. No course in which a student has received a grade of P is accepted toward a major.

10. Any student who fails at the end of any quarter to secure full credit for two-thirds of his scheduled courses shall be considered to be on probation for the following quarter.

11. A student making marks of F or Cn in more than one-half of his assigned work for any quarter will be denied future registration except he first petitions the faculty and gains their consent to future registration.

Classification of Students

For Freshman Standing. No student will be classified as a freshman who has less than fourteen units as entrance credit. Fifteen units are required for unconditioned entrance.

For Junior Standing. The completion of at least 90 quarter-hours and not less than 100 quality points.

For Senior Standing. The completion of at least 135 quarter-hours and not less than 135 quality points.

Conditions of Graduation

As a condition of graduation, a student must complete 186 hours (including six hours of physical education) this being the equivalent of fifteen class exercises a week for twelve quarters.

On credits made after September 1, 1920, as a further condition of graduation, a student must have earned 180 quality points. Points are based on the credit marks, as follows: Each hour of Ex (excellent) counts 3 points; of G, (good) 2 points; of Av, (average) 1 point; of P, (pass) 0 point; of Cn, (condition) -2 points; and of F, (fail) -3 points.

Diplomas are awarded at the Commencement exercises, which are held but once a year, at the close of the Spring Quarter. Those who have finished their work at the close of any previous quarter are expected, as far as possible, to be present at the commencement exercises. Those whose work, beyond question, will be finished by the close of the Summer

Quarter are entitled to all the privileges of the graduating class, but the diplomas are not issued until the requirements are fully met. In order to have a seat and part in the class organization, credentials must be obtained from the Registrar.

PRE-PROFESSIONAL COURSES

Pre-Medical Course

Medical Colleges of first rank demand as minimum requirements for admission that the candidate shall have completed a four-year high school or preparatory course with at least 15 units credit, and the first two years, or equivalent, of a college course which stresses the basal sciences upon which the study of medicine rests.

A total of not less than 90 quarter hours (60 semester hours), exclusive of physical education, are required. Altho 90 credit hours of satisfactory work may admit the student to the study of medicine, yet it is highly recommended by both the faculty of Ohio Northern University and the Medical College faculties that the college work should include three years or 135 quarter-hours (90 semester hours).

The pre-medical student may begin the work during the Summer Quarter. However, it is much more desirable that the work be started with the Fall Quarter. The collegiate courses which are required of pre-medical students are represented in the following table:

FIRST YEAR

Fall Quarter	Winter Quarter	Spring Quarter
English 1	English 2	English 21
French or German	French or German	French or German
Chemistry 1	Chemistry 2	Chemistry 3
Biology 1	Biology 2	Biology 3

SECOND YEAR

Fall Quarter	Winter Quarter	Spring Quarter
French or German	French or German	French or German
Biology 4	Biology 5	Biology 6
Chemistry (organic)	Chemistry (organic)	Chemistry (quan.)
Physics 9	Physics 10	Physics 11
Psychology 1	Psychology 2	Psychology 3

Students who expect to enter Medical Colleges that require Latin for admission should plan to complete two units (Latin Grammar and Cæsar) while in the high school, or in the Preparatory School of Ohio Northern, in addition to the above courses. Students having had a year laboratory course in high school Biology may omit college Biology the first year, and substitute the courses in Zoology. In case this is done Mammalian Anatomy and courses in Sociology or Economics may be substituted for Zoology during the second year.

Arts-Medicine Combination Course

Upon the completion of nine quarters of work in the College of Liberal Arts, the student may be granted a leave of absence for the Senior year, and receive the Bachelor of Science degree upon the successful completion of the first year of work in the medical school. This means a saving of at least one year of time. Pre-medical students are urged to give favorable consideration to the combination course and receive both the B. S. degree from this institution and the professional degree from the medical school.

The following regulations obtain:

1. At least 140 quarter-hours, exclusive of physical education are required, which must include the regular prescribed courses for the Bachelor's degree.

2. At least 90 quarter hours must be completed in this institution.

3. The student must maintain a high standard of scholarship in order that the first year of medicine may apply as Senior work.

4. The student is subject to the regulations, as far as they admit, of the College or Liberal Arts until graduation.

5. The medical work must be done in an A class medical school.

6. Certificates of the completion, with high grade, of the first year's work in the medical school.

Pre-Dental Work

The better dental schools of the country are requiring one year of collegiate work, known as a pre-dental year, consisting of at least 45 quarter-hours (30 semester hours), in addition to the completion of 15 units of high school work. By agreement these schools insist that in these hours should be included at least 9 quarter-hours of college chemistry, 9 quarter-hours of biology or zoology and 9 quarter-hours of college English. Unless the student has offered one unit of high school physics as entrance, an equivalent of college physics must also be taken. Additional hours to complete the schedule may be taken as indicated in the pre-dental course following:

FIRST YEAR

Fall Quarter	Winter Quarter	Spring Quarter
English 1	English 2	English 21
Chemistry 1	Chemistry 2	Chemistry 3
Biology 1 or Biology 4	Biology 2 or Biology 5	Biology 3 or Biology 6
Physics 9	Physics 10	Physics 11

If the student presents evidence that he has had a satisfactory course in high school Biology, he may elect the courses in Zoology instead of those in Biology. The courses in college Physics are optional, if student enters with one unit of high school physics. In case the courses in physics are not required an option is given on year's work in one of the following: Psychology 1, 2, 3; Economics 1, 2, 3; History 1, 2, 3. The student is permitted to carry 15 to 17 hours per week.

Pre-Commerce Course

The Pre-Commerce Course outlined is designed to meet the requirements of colleges and universities that provide commerce courses leading to degrees. It provides a basis for the more specialized courses that are to follow in the third and fourth years, thus making an introduction to those specialized courses that train for leadership in business. Students will do well to select the institution in which they expect to complete their commerce work so that their pre-commerce studies may properly coalesce with those of the institution selected.

FIRST YEAR

Fall Quarter	Winter Quarter	Spring Quarter
English 1	English 2	English 21
Mathematics 1	Mathematics 2	Mathematics 4
Modern Language	Modern Language	Modern Language
Economics 10	Economics 11	Economics 12

SECOND YEAR

Fall Quarter	Winter Quarter	Spring Quarter
English 3	English 23	English 11
Biology 1 or Chemistry 1	Biology 2 or Chemistry 2	Biology 3 or Chemistry 3
Modern Language	Modern Language	Modern Language
Psychology 1 or Accounting 1	Psychology 2 or Accounting 2	Psychology 3 or Economics 3
Economics 1	Economics 2	

If Chemistry is elected instead of Biology, one of the other courses must be omitted in the second year.

Pre-Agriculture Course

The University offers only those course in which it has ample laboratory facilities for thorough teaching. For this reason the school of Agriculture offers accredited instruction only for the first two years of a four year course, paralleling in these two years the curriculum of leading state agricultural colleges. Students are advised to complete their last two years in a State University, which, by reason of superior technical facilities for specialized courses, is enabled to serve the student more advantageously.

FIRST YEAR

Fall Quarter	Winter Quarter	Spring Quarter
Chemistry 1	Chemistry 2	Chemistry 3
English 1	English 2	English 21
Biology 7	Biology 8	Biology 9
Mathematics 1	Mechanical Drawing I.	Physics 12

SECOND YEAR

Fall Quarter	Winter Quarter	Spring Quarter
Biology 4	Biology 5	Biology 6
Economics 1	Economics 2	Economics 3
Modern Language	Modern Language	Modern Language
Horticulture 1	Horticulture 2	Horticulture 3

DESCRIPTION OF COURSES

NOTE: Unless otherwise indicated five hour courses meet daily, three hour courses meet on Monday, Wednesday and Friday, and two hour courses meet on Tuesday and Thursday.

Department of Agriculture

ASSISTANT PROFESSOR STAUFFER

Horticulture 1. Principles of Horticulture (Fall) 3 Hrs.

Horticulture 2. Principles of Horticulture (Winter) 3 Hrs.

The principles underlying plant growth and the factors of environment as they are related to orchard, garden, greenhouse and nursery practice are studied. Methods of propagation are taken up in detail. Two hours a week recitation, two hours laboratory.

Horticulture 3. Plant Variations (Spring) 3 Hrs.

A brief discussion of the history of heredity, evolution and plant improvement is followed by a study of the modification of plants under cultivation through variation and mutation. Lectures and recitations.

It is desirable that the study of these courses be either preceded by, or concurrently taken with, either Biology or Botany.

Department of Biology

DEAN HUBER AND ASSISTANT PROFESSOR STAUFFER

Biology 1. General Biology (Fall) 3 Hrs.

Two hours a week lecture and discussion, three hours laboratory. 9:30—11:30.

Course 1. deals with some of the essential problems found in plant life. Such topics are treated: Cell structure, tissue differentiation, methods of reproduction, food manufacture, metabolism, decay, evolution.

Biology 2. General Biology (Winter) 3 Hrs.

Two hours a week lecture and discussion, three hours laboratory. 9:30—11:30. Course 2 is given to the study of biological facts as evidenced in the animal kingdom.

Biology 3. General Biology (Spring) 3 Hrs.

Two hours a week lecture and discussion, three hours laboratory. 9:30—11:30. Course 3 is a continuation of General Biology 2. Prerequisite: Biology 2.

Biology 4. General Zoology (Fall) 4 Hrs.

Two hours a week lecture and discussion, four hours laboratory. 8:30—11:30.

Biology 5. General Zoology, (Winter) 4 Hrs.

Two hours a week lecture and discussion, four hours laboratory. 8:30—11:30.

Biology 6. General Zoology (Spring) 4 Hrs.

Two hours a week lecture and discussion, four hours laboratory. 8:30—11:30.

These courses in General Zoology constitute a year's work. Representative types form the basis for the study of structure, relationship, development and distribution. Economic importance is given consideration. Prerequisites: Courses 1, 2, and 3 in General Biology. Premedical students presenting a year's work in high school Biology, including laboratory exercises, may omit the courses in General Biology upon advice from the instructor.

Biology 7. Botany (Fall) 4 Hrs.

Two hours a week lecture and quiz. Four hours laboratory. 1:00—3:00.

Biology 8. Botany (Winter) 4 Hrs.

Two hours a week lecture and quiz. Four hours laboratory. 1:00—3:00.

Biology 9. Botany (Spring) 4 Hrs.

Two hours a week lecture and quiz. Four hours laboratory. 1:00—3:00.

The courses in Botany constitute a year's work. A major portion of the time is devoted to the consideration of the physiological processes of plants; the remainder of the year's work involves a study of the structure, development and evolution of plants. Prerequisites: Biology 1, 2, 3.

Biology 10. Systematic Botany (Summer) 3 Hrs.

A systematic study of the local flora. Especially designed for teachers and agricultural students. Six to eight hours field work and laboratory per week.

Biology 11. Dendrology (Spring) 3 Hrs.

7:00—11:30. Th. or Sat.

A laboratory and field course designed to acquaint the student with the trees and shrubs represented in the local flora, in both the winter and summer conditions. Lectures upon structure, classification, uses and distribution. Schaffner's Field Manual of Trees is used as a key.

Biology 12. Histological Technique and Biological Methods. 3 Hrs.

Lecture and class work two hours, laboratory six to eight hours. Hours to be arranged. A practical course for students who intend to do advanced work and for teachers of biology. Methods of collecting, killing, preserving and preparing material for demonstration and laboratory purposes are considered. Problems which are likely to be met in the biological labora-

tory of secondary schools are discussed. Those desiring this course will notify the instructor several weeks in advance. Course limited to ten students. Laboratory fee to be fixed. Lecture and recitation two hours a week, laboratory six to eight hours. Prerequisites: Courses 4, 5, 6, 7, 8 and 9, or equivalent. Summer.

Biology 13. Mammalian Anatomy (Spring) 4 Hrs.

A thorough dissection is made of a typical mammal. This course is designed especially for pre-medical students. Two hours lecture and quiz, four hours laboratory. Hours to be arranged. Prerequisites: Biology 4, 5, 6. (1924).

Department of Chemistry

PROFESSORS SLEESMAN AND HARROD

Chemistry 1. General Inorganic Chemistry 4 Hrs.

Chemistry 2. General Inorganic Chemistry 4 Hrs.

Chemistry 3. General Inorganic Chemistry 4 Hrs.

Courses 1 and 2 consist of a careful study of the fundamental laws of chemistry, with special emphasis on gases, solutions, ionization, equilibrium, methods of determining molecular weights, and colloids. The principles involved are applied to the study of the common nonmetallic elements. Course 3 consists of a study of the physical and chemical properties of the common metallic elements and their compounds together with work in qualitative analysis. Each of these courses is given every Quarter. Three hours lecture and quiz, four hours laboratory.

Chemistry 4. Qualitative Analysis (Fall and Spring) 5 Hrs.

Chemistry 5. Qualitative Analysis. (Winter and Summer) 5 Hrs.

These courses give the student a thorough training in laboratory manipulation and a knowledge of the chief chemical reactions needed for the identification of the more common elements and their compounds. The theories of solution are emphasized. Laboratory work in Course 4 consists of experiments and reactions with known reagents; Course 5 with the analysis of at least twelve individual unknowns. Two hours lecture, six hours laboratory. Prerequisites: Chemistry 1, 2 and 3.

Chemistry 6. Organic Chemistry (Fall) 5 Hrs.

Chemistry 7. Organic Chemistry (Winter) 5 Hrs.

These courses constitute a study of the structure and constituents of the carbon compounds; the carbohydrates and hydrocarbons with their many addition and substitution products. Lecture and quiz three hours, four hours laboratory. Prerequisites: Chemistry 1, 2 and 3.

Chemistry 8. Quantitative Analysis (Spring) 5 Hrs.

Work in volumetric and gravimetric analysis; the determination of acidity and alkalinity; the analysis of inorganic and organic salts. Oxidation, reduction and iodimetry experiments are made. Lecture two hours, laboratory six hours. Prerequisites: Chemistry 4.

Chemistry 9. Analytical Chemistry (Spring)

A course designed to meet the requirements of students who desire to make a more thorough study of some special analytical methods. Work from the following subjects as well as others can be arranged: the analysis of coal and coke, ores, steel, clays, cement and limestone, water, boiler scale, slag, etc. Credit and hours to be arranged. Prerequisites: Chemistry 4, 5 and 8.

Chemistry 10. Industrial Organic Chemistry (Spring) 5 Hrs.

A course designed to acquaint the student with the application of organic compounds and analytical methods as applied to the industries. Lecture and quiz three hours, laboratory four to six hours. Prerequisites: Chemistry 6 and 7.

Chemistry 11. Industrial Inorganic Chemistry (Summer) 4 Hrs.

Lecture and discussion four hours a week. Prerequisites: Chemistry 1, 2 and 3.

Chemistry 12. Physical Chemistry (Spring) 3 Hrs.

A systematic study is made of the important theories and generalizations of the various fields of chemistry. Modern theories of solution, diffusion, dissociation, chemical equilibrium, osmosis, catalysis, electrical conductivity, mass action, and chemistry of colloids. The purpose of this course is to prepare premedical and other biological students for the study of biochemistry. Lecture and discussion of assigned readings. Prerequisites: Chemistry 4, 6, 7 and 8.

Department of Education

DR. DAVISON

History of Education 1. Before the Middle Ages (Fall) 3 Hrs.**History of Education 2. During the Middle Ages (Winter) 3 Hrs.****History of Education 3. Modern Times (Spring) 3 Hrs.**

History of Education 1, 2, and 3 are required of seniors in both courses in education, but the outside readings are adjusted to the special interests of both classes of students. Open to Liberal Arts students who have had psychology.

Secondary Education 1. Principles and Problems (Fall) 3 Hrs.**Secondary Education 2. Principles and Problems (Winter) 3 Hrs.****Secondary Education 3. Principles and Problems (Spring) 3 Hrs.**

The principles of education founded upon psychology, biology and sociology are studied to final working bases. The dogmatical is not attempted, but a rational view-point towards present educational problems is emphasized. Open to Liberal Arts students who have had psychology, and who elect history of education.

Department of English

PROFESSORS FREEMAN AND DEMING

English 1 and 2 may not be counted toward a major in this department.

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| English 1. College Rhetoric (Fall and Spring) | 3 Hrs. |
| Exposition and Argumentation. Daily themes. | |
| English 2. College Rhetoric (Winter and Summer) | 3 Hrs. |
| Description and narration. Daily themes. Prerequisites: English 1. | |
| English 3. Argumentation (Fall) | 3 Hrs. |
| A detailed study of the principles of argumentation; practice in brief making and in debating. Prerequisites: English 1 and 2. | |
| English 23. Argumentation (Winter) | 3 Hrs. |
| A continuation of English 3. Prerequisite: English 3. | |
| English 4. The Short Story (Winter) | 2 Hrs. |
| A study of the technique of the short-story. Practice in the writing of the short-story. Given upon sufficient demand. | |
| English 24. The Short Story (Spring) | 2 Hrs. |
| A continuation of English 4. Given upon sufficient demand. | |
| English 5. Expository Writing (Fall) | 2 Hrs. |
| Prerequisites: English 1 and 2. | |
| English 25. Expository Writing (Winter) | 2 Hrs. |
| A continuation of English 5. Prerequisite: English 5. | |
| English 6. Survey of English Literature (Fall) | 3 Hrs. |
| Prerequisites: English 1 and 2. | |
| English 7. Survey of English Literature (Winter) | 3 Hrs. |
| Prerequisite: English 6. | |
| English 8. Poetics I (Winter) | 2 Hrs. |
| Prerequisites: English 1, 2, 6 and 7. | |
| English 9. Poetics II (Spring) | 2 Hrs. |
| Prerequisite: English 8. | |
| English 10. Shakespeare (Winter) | 3 Hrs. |
| Histories. Given upon sufficient demand. Prerequisites: English 1, 2, and 7. | |

English 11. Shakespeare (Spring)	3 Hrs.
Tragedies. Prerequisites: English 1, 2 and 7.	
English 12. Shakespeare (Summer)	3 Hrs.
Comedies. Prerequisites: English 1, 2 and 7.	
English 13. Milton (Summer)	3 Hrs.
The poetry of Milton is read and studied. Prerequisites: English 1, 2, 7 and 8. (1924).	
English 14. Nineteenth Century Poetry (Fall)	3 Hrs.
A survey of Wadsworth, Scott, Byron, Keats, Shelly, Morris, Swinburne, and Rossetti.	
English 15. Nineteenth Century Poetry (Winter)	3 Hrs.
A study of the poetry of Tennyson.	
English 16. Nineteenth Century Poetry (Spring)	3 Hrs.
A study of Browning.	
English 17. Nineteenth Century Essayists (Fall)	3 Hrs.
Prerequisites: English 7 and 8. Given upon sufficient demand.	
English 18. Nineteenth Century Essayists (Winter)	3 Hrs.
Prerequisites: English 7 and 8. Given upon sufficient demand.	
English 19. The English Novel (Summer)	3 Hrs.
The development of the novel and its place in English Literature. Study and criticism. Prerequisites: English 7 and 8.	
English 20. Literary Criticism (Spring)	3 Hrs.
A study of the principles of literary criticism as applied to the various forms of literary expression. Open only to Seniors. (1924).	
English 21. American Poetry (Spring)	3 Hrs.
English 22. American Prose (Summer)	3 Hrs.

Department of Greek

PROFESSOR SCHOONOVER

I. PREPARATORY COURSES

Greek 1. White's First Greek Book	5 Hrs.
Greek 2. White's First Greek Book	5 Hrs.
Greek 3. White's First Greek Book	5 Hrs.
Greek 4. Xenophon's Anabasis	5 Hrs.
Greek 5. Xenophon's Anabasis	5 Hrs.

II. ADVANCED COURSES

Greek 6. Epic Poetry—Homer's Iliad	5 Hrs.
Greek 7. Epic Poetry—Homer's Iliad	5 Hrs.

Greek 13. Sacred Greek—One of the Gospels. 5 Hrs.

The work mentioned in courses 4-13 inclusive, is pursued one quarter. A literary study of the period is a part of each course.

Department of History

PROFESSOR NISWANDER

History 1, 2 and 3 may not be counted toward a major in this department.

History 1. Western Europe	(Fall)	3 Hrs.
History 2. Western Europe	(Winter)	3 Hrs.
History 3. Western Europe	(Spring)	3 Hrs.

A comprehensive survey of the history from the barbarian invasions to the present time. Both as to content and methods of study, the work is introductory. History I. will be offered in Summer quarter of 1923.

History 4. English History	(Fall)	3 Hrs.
History 5. English History	(Winter)	3 Hrs.
History 6. English History	(Spring)	3 Hrs.

An introductory study of English History from the earliest times to the present; the object being to gain a general knowledge of the subject, or for those specializing in American History or English Literature. It is also recommended for secondary teachers. (1923-24).

History 7. Renaissance and Reformation	(Fall)	2 Hrs.
History 8. Renaissance and Reformation	(Winter)	2 Hrs.
History 9. Renaissance and Reformation	(Spring)	2 Hrs.

This course deals with the development of civilization in Italy, Germany, and England in the period from Dante to Luther; the causes, nature and results of the Protestant revolt and the Catholic reformation. The object is to see as clearly as possible the relation of these movements to the present-day civilization. Special study is made of the dominant personalities of the period and the political, economic and social, as well as the strictly religious causes of the reformation. Prerequisites: History 1, 2 and 3, or equivalent. (1923-24).

History 10. French Revolution	(Fall)	3 Hrs.
History 11. Europe Since 1815	(Winter)	3 Hrs.
History 12. Europe Since 1815	(Spring)	3 Hrs.

As detailed a study as time will permit of the Old Regime; the causes, progress and permanent results of the Revolution; the rise of the Napoleonic empire and institution; the public and private career of the great conqueror and es-

pecially the growth of democratic institutions in the nineteenth century. Prerequisites: History 1, 2, 3, or equivalent.

- History 13. American History (Fall) 3 Hrs.
 History 14. American History (Winter) 3 Hrs.
 History 15. American History (Spring) 3 Hrs.

A general study of the history of the United States from the discovery of America to the present time. Political, constitutional and economic phases will receive chief attention.

- History 16. Recent American History (Fall) 3 Hrs.
 History 17. Recent American History (Winter) 3 Hrs.
 History 18. Recent American History (Spring) 3 Hrs.

In this course a detailed study of the history of the United States since 1870 is made. The work is intended for those students who expect to teach history, or those majoring in the Social Sciences. Prerequisites: Course 1, 2, 3, 13, 14, 15.

- History 19. The Teaching of History 2 Hrs.

Lectures and reading upon methods of teaching history in the secondary school, examination of text-books, followed by practice work in the preparation of lesson for teaching, and the conduct of recitation. This course should be taken by all who desire to be recommended for teaching positions in this subject. This course will be offered in the Spring and Summer.

Department of Latin

PROFESSOR SCHOONOVER

It is the aim of this department to utilize as fully as possible the efficiency of Latin as an instrument of education and a means of culture. The student's effort is directed toward an appreciation of Roman writings from a literary viewpoint and as exhibiting the genius of the age in which they were written.

- Latin 5. Cicero—De Senectute et Amicitia (Fall) 5 Hrs.
 Latin 6. Horace—Odes and Epodes (Winter) 5 Hrs.
 Latin 7. Livy—Selections from Books XX. and XXII. (Spring) 5 Hrs.

Courses 5, 6 and 7 are open to students who have presented four units of Latin for College entrance.

- Latin 8. Virgil—Eclogues and Bucolics 3 Hrs.
 Latin 11. Private Life of the Romans 2 Hrs.

Text-books for courses 12, 13 and 14; McKail's Latin Literature and the Oxford Book of Verse.

- Latin 15. Teacher's Training Course (Summer) 2 Hrs.

Lectures and discussions on methods of teaching para-

digms, translation, vocabulary and composition. Portions of the authors commonly studied in secondary schools are read, in class, to illustrate the discussions. Open only to seniors whose major work is in the Latin department.

Latin 16. Advanced Composition

2 Hrs.

Department of Mathematics

PROFESSORS BECKWITH AND FAIRCHILD

This department offers courses primarily (1) as a part of a liberal education, (2) as requirements for engineering students, and (3) for prospective graduate students in mathematics and physics. In all courses, the theory is developed, followed by the application to exercises and practical problems where possible.

Those who take any mathematics are advised to complete courses 7, 8 and 9. Those who major in mathematics and prospective graduate students in mathematics, should complete courses 10, 12, 13 and 14. Students in applied mathematics should follow course 9 by courses 10, 12 and 13.

Outline of courses:

Mathematics 1. College Algebra

5 Hrs.

Topics: Rational Fractions; Binomial Theorem; Evolution; Irrational Functions; Quadratic Equations; Equations in Quadratic Form; Simultaneous Quadratic Equations; Ratio, Proportion and Variation; Arithmetical, Geometrical and Harmonical Progressions. Prerequisites: College Entrance Units, including $1\frac{1}{2}$ units High School Algebra. Each Quarter.

Mathematics 2. College Algebra

4 Hrs.

Topics: Imaginary and Complex Numbers; Logarithms; Mathematical Induction; Theory of Equations; Determinants. Prerequisite: 1. Winter, Spring and Summer Quarters.

Mathematics 3. Trigonometry

5 Hrs.

Topics: Definitions; Trigonometric Functions and Equations; Solution of Plane Triangles; Certain Applications. Prerequisite: College Entrance Units, including High School Algebra, $1\frac{1}{2}$ units and Plane and Solid Geometry, $1\frac{1}{2}$ units. Fall, Winter, and Summer Quarters.

Mathematics 4. Trigonometry (Spring)

3 Hrs.

Topics: Complex Numbers; DeMoivre's Theorem; Trigonometric Series; Hyperbolic Functions; Spherical Trigonometry with Applications to Geodesy and Astronomy. Prerequisite: 3.

Mathematics 5. Analytic Geometry

4 Hrs.

Topics: Loci and their Equations; the Straight Line; the Circle; Graphs in Rectangular and Polar Co-ordinates; Transformations; Conic Sections. Prerequisites: 1, 3. Winter, Spring and Summer Quarters.

Mathematics 6. Analytic Geometry 4 Hrs.

Topics: Conic Sections; Tangents; Parametric Equations and Loci; Space Co-ordinates and Loci; the Plane; Special and Quadric Surface; Empirical Equations. Prerequisites: 5. Fall, Spring and Summer Quarters.

Mathematics 7. Calculus (Differential) 4 Hrs.

Topics: Functional Notation; Total and Partial Differentiation, with Applications; Successive Differentiation; Differentials; Implicit and Explicit Functions; Covergence and Divergence of Infinite Series; Expansion of Functions; Indeterminate Forms; Maxima and Minima of Functions of one Variable. Prerequisite: 5. Fall, Spring, and Summer Quarters.

Mathematics 8. Calculus (Differential and Integral) 4 Hrs.

Topics: Change of Variable; Maxima and Minima of Functions of two or more Variables; Direction of Curves; Tangents and Normals; Tangent Plane and Normal Line; Direction of Curvature; Curvature and Radius of Curvature; the Osculating Circle; Envelopes; Methods of Integration by Type of Integrand; Applications of Simple Integration. Prerequisite: 6, 7. Fall and Winter Quarters.

Mathematics 9. Calculus (Integral) (Winter and Spring) 4 Hrs.

Topics: Integration by Parts; Reduction Formulae; Integration by Substitution; Integration as a Summation; Applications; Successive Integration and the Application to Surfaces, Volumes, Moments of Inertia, Centers of Gravity, Fluid Pressure and Attraction at a Point; Hyperbolic Functions; the Cycloid. Prerequisite: 8.

Mathematics 10. Differential and Integral Calculus (Advanced)
(Fall) 4 Hrs.

Topics: Implicit Functions and their Differentiation; Application to Curves and Surfaces; Taylor's Series with elementary Applications to Curves, Indeterminate Forms, and Maxima and Minima; Extension of Taylor's Theorem to Functions of more than one Variable; Singular Points of plane Curves and Surfaces; Definite Integral and the Geometrical Concept; Green's Theorem; Stokes' Theorem; Line and Surface Integrals; Multiple Integrals; Integration of Total Differentials. Prerequisite: 9.

[Goursat-Hedrick: Mathematical Analysis (Vol. I) will be referred to in this course.]

Mathematics 11. Astronomy (Descriptive) (Fall) 3 Hrs.

Topics: Reference Points and Lines; the Constellations; the Earth and its Motion; Time; the Moon; the Solar System; the Planets; Comets and Meteors; the Sun; the Stars and Nebulae. (Eight hours of Observations with Notes are required). Prerequisite: 4.

- Mathematics 12. Differential Equations (Winter) 3 Hrs.**
 Topics: Equations of the first Order and Degree; Equations of the first Order, but not of the first Degree; Equations of the second Order; Linear Equations with constant Coefficients. Prerequisite: 9.
- Mathematics 13. Theoretical Mechanics (Spring) 5 Hrs.**
 Topics: Center of Gravity; Moment of Areas and Mass; Moment of Inertia; Ellipse of Inertia; Kinematics of a Point; Kinetics of a Material Particle; Work; Energy; Impulse; the Simple Pendulum. Prerequisite: 9.
- Mathematics 14. Theory of Functions of a Complex Variable (Elementary Course) (Spring) 4 Hrs**
 Topics: The Rational Functions and Stereographic Projection. Automorphic Functions; Continuity of a Rational Function of a Complex Variable; Derivative of a Rational Function of a Complex Variable; Conformal Representation; the Integral of a regular Function of a Complex Variable. Prerequisite: 10.
- Mathematics 15. History of Mathematics (Summer) 3 Hrs.**
 A systematic survey of the Historical Development of Mathematics.

Department of Modern Languages

PROFESSOR DAVIS AND ASSISTANTS

Romanic Languages and Literature

The study of a foreign language should enable a person to use it conversationally; to read it for literary and scientific purposes; and to write it for business correspondence. The courses in this department are designed to meet both cultural and practical needs. The advanced courses afford opportunity for students to major in languages. If a student expects to do university graduate work, he should have a working knowledge of two modern languages, preferably French and German.

FRENCH

Elementary Courses

- | | |
|--|--------|
| French 1. Elementary French (Fall) | 5 Hrs. |
| French 2. Elementary French (Winter) | 5 Hrs. |
| French 3. Intermediate French (Spring) | 5 Hrs. |
| French 4. Intermediate French (Summer) | 5 Hrs. |

These are beginning courses and are designed for students who do not present entrance credits in French but desire a working knowledge of the language. These four courses or their equivalent (two high school units) prepare the student for the courses in college French, and comprise the essentials

of grammar, the acquisition of a working vocabulary, verbs and idioms, and practice in speaking and reading the language. Especial stress is laid on the mastery of a good pronunciation. No credit toward graduation is given for elementary language courses until completed.

Collegiate French

French 5.	Introduction to French Literature	(Fall)	3 Hrs.
French 6.	Survey of the 18th and 19th centuries	(Winter)	3 Hrs.
French 7.	Modern Tendencies in French Literature	(Spring)	3 Hrs.
French 8.	Masterpieces of Romanic Literature	(Summer)	3 Hrs.

A survey of French literature from the origins to the present day. French history is required as parallel reading, with selections from authors of the various periods. French 5, 6 and 7 treat of the literature of the Renaissance and Classical periods in relation to modern forms, and influence on English literature; of the philosophic age, the romantic and realistic movements, and the democratic tendencies of nineteenth century literature. Prerequisite, two years of high school or four quarters of college French. French 8 is a critical study of the great authors of southern Europe and of their influence on European literature. Much reading is required in translations from Dante, Petrarch, Boccaccio, Ariosto, Tasso; Cervantes and the great dramatists of Spain; Rabelais, Montaigne, Moliere, Hugo, etc. of France. No knowledge of the Romanic languages is needed for French 8. Given in the summer quarter only.

French 9.	Conversation, Composition and Phonetics	(Fall)	2 Hrs.
French 10.	The French Novel	(Winter)	2 Hrs.
French 11.	Contemporary French Writers	(Spring)	2 Hrs.
French 12.	French Poetry	(Summer)	2 Hrs.

Colomba forms the basis for practice in oral and written French. Idioms from the text learned, grammar reviewed, laboratory practice in phonetics; phonograph records by artists as models, weekly themes in French. Prerequisite, two years of French. French 10 and 11 consist of lectures, collateral reading and reports; French 12 is an introduction to lyric poetry from texts and music. (Commercial composition for those who desire it.)

French 13, 14.	The French Drama	(Winter and Spring)	3 Hrs.
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This course alternates with French 10, 11. Studies in the works of Corneille, Racine and Moliere with lectures and readings from the tragedy and comedy of the 18th century, and plays by later writers chosen mainly with a view to showing dramatic treatment of social questions.

French 15, 16, 17. The Development of Social Ideals in

French Literature 2 Hrs.

This course alternates with French 5, 6 and 7. The following types will be studied: "le chevalier" of the Middle Ages (la Chanson de Roland); "l'escolier" (Francois Villon); "l'homme de la Renaissance" (Montaigne, Rabelais); "l'honnête homme" of the 17th century (Moliere, La Fontaine, Pascal); "le Philosophe" of the 18th century (Voltaire, Rousseau); "le romantique" of the 19th century (Lamartine, Musset); "l'intellectuel" (Renan, Anatole France).

French 18. Scientific French (Fall)

2 Hrs.

Intended for students who desire to read readily scientific French texts and periodicals. The stress will be placed on acquiring the ability to get the meaning of the printed page rather than on language training. Open to students who have had two years of French.

French 19. Teachers' Course (Summer)

2 Hrs.

A course for prospective teachers of French and Spanish. Required of majors and all who seek the recommendation of the department as teachers of these subjects in the high schools. Methods, selection of text-books, scientific methods of teaching pronunciation, grammar, and composition. Prerequisite, three years of French. Practice teaching credit in Education. Recitations, reports and private conferences.

SPANISH

Elementary Courses

Spanish 1. Elementary Spanish (Fall)	5 Hrs.
Spanish 2. Elementary Spanish (Winter)	5 Hrs.
Spanish 3. Intermediate Spanish (Spring)	5 Hrs.
Spanish 4. Intermediate Spanish (Winter)	5 Hrs.

These are classes for beginners similar to Elementary and Intermediate French, and must precede all other courses in Spanish. Castilian pronunciation, grammar, memory and oral drill, with easy graded reading.

Collegiate Spanish

Spanish 5. Survey of Spanish Literature (Fall)	5 Hrs.
Spanish 6. Classical Writers (Winter)	5 Hrs.
Spanish 7. Modern Writers (Spring)	5 Hrs.

The history of Spain and Spanish literature from the origins to the present time, with assigned readings from literature of the various periods; conversation based on the texts read, themes in Spanish.

- Spanish 8. Literary Relations of Spain with France and England.
(See French 8.) (Summer) 3 Hrs.

- Spanish 9. Commercial Spanish. 2 Hrs.

To be taken concurrently with Spanish 5, 6 and 7, and intended to give the student a working knowledge of present-day conditions, opportunities, business forms and methods in the principal Hispanic countries. The class-work will be supplemented by collateral reading of Spanish-American literature, and by the use of correspondence representing actual business transactions.

- Spanish 10. Survey of the Spanish Drama (Fall) 3 Hrs.

- Spanish 11. Modern Spanish Drama (Winter) 3 Hrs.

- Spanish 12. Spanish Poetry (Spring) 3 Hrs.

This course alternates with Spanish 5, 6 and 7, and is an intensive study of a limited number of works of representative dramatists and poets, with lectures, collateral reading and reports.

GERMANIC LANGUAGE AND LITERATURE

- German 1. Elementary German (Fall) 5 Hrs.

- German 2. Elementary German (Winter) 5 Hrs.

- German 3. Intermediate German (Spring) 5 Hrs.

- German 4. Intermediate German (Summer) 5 Hrs.

Pronunciation, essentials of grammar, composition, verb drill, easy graded reading preparatory to reading science from texts and periodicals.

- German 5. Survey of German Literature (Fall) 3 Hrs.

- German 6. Modern Prose and Poetry (Winter) 3 Hrs.

- German 7. German Drama (Spring) 3 Hrs.

- German 8. Interrelations with Eng. Lit. (Summer) 3 Hrs.

An outline of German Literature from the beginnings to the present time. Selections will be read from different periods showing the recent trend of literature and the influence of German literature on other lands. The summer course will be given in translations and no knowledge of German is required. Prerequisite for German 5, 6 and 7 is two years of German.

- German 9. Scientific German (the year) 2 Hrs.

A course to enable the student to read German technical literature. This is preceded by drill on word formation, word compounds, sentence structure. May be taken concurrently with 5, 6 and 7.

Department of Philosophy and Religious Education

PROFESSOR BURRIS

PHILOSOPHY

Philosophy 1. The Spiritual in Life (Fall) 3 Hrs.

An examination of the nature of progress and civilization, giving a definition of progress; a tracing of the tendencies of the progress seen in the various sciences and in the different movements of practical life; and a determination of the general direction in which all progress is moving.

Philosophy 2. The Destiny of Man (Winter) 3 Hrs.

An examination of the directions of progress and a determination of what the outcome of evolution or progress has been thus far, and the probable outcome of all endeavor.

Philosophy 3. The Philosophy of Prayer (Spring) 3 Hrs.

An examination of the literature on prayer, and a research into the nature, principles and meaning of prayer together with the great secrets of power and insight.

Philosophy 4. Ethics (Summer) 3 Hrs.

A study of the meaning of the moral; its origin, nature, development and application to the practical affairs of life.

Philosophy 5. History of Philosophy (Fall) 3 Hrs.

Philosophy 6. History of Philosophy (Winter) 3 Hrs.

Philosophy 7. History of Philosophy (Spring) 3 Hrs.

These three courses in philosophy trace the movements of philosophical thought up to and including (a) the time of Christ, (b) the close of the nineteenth century, and (c) recent and present philosophy. The courses must be taken in sequence.

Philosophy 8. General History of Philosophy (Summer) 3 Hrs.

In this course a general view of the whole field of philosophical thought is given. Prerequisites: Philosophy 5, 6 and 7.

Philosophy 9. Logic (Winter) 3 Hrs.

Elements from text. Practical training in detecting the more common fallacies and in illustrating the condition of proof and laws of evidence. Open to seniors.

Philosophy 10. The New Civilization (Spring) 5 Hrs.

Prerequisites: Philosophy 1, 2, 5, 6, 7 and 8.

RELIGIOUS EDUCATION

Bible 1. Old Testament (Fall) 3 Hrs.

Bible 2. Old Testament (Winter) 3 Hrs.

A study of the religious development of the Hebrews, emphasizing both the religious and social contributions of the Hebrew people to civilization up to the time of the New Testament.

Bible 3. Life of Christ (Spring) 3 Hrs.

An examination of the historical conditions at and before the time of Christ and Christ's religious and social messages. The aim of the course is to enable the student to construct his own Life of Christ.

Bible 4. Christianity in the Apostolic Age (Summer) 3 Hrs.

The development of primitive Christianity from Christ's ascension to the close of the Apostolic Era based largely on the book of Acts, but the Epistles are also used in so far as they reflect the conditions of life and thought during the period. Prerequisite: Bible 3.

Christian Religion 1. Church History (Fall) 3 Hrs.

A survey of the origin, growth, spread and influence of Christianity on the nations of the world.

Christian Religion 2. Comparative Religions (Winter) 3 Hrs.

The Christian religion and all other so-called religions are studied and compared as to their value and contributions.

Christian Religion 3. Foreign Missions (Spring) 3 Hrs.

An examination of foreign conditions and needs.

Christian Religion 4. Home Missions (Summer) 3 Hrs.

A study of home conditions and needs.

Christian Religion 5. Evidences of Christianity (Fall) 3 Hrs.

A study of the grounds and great principles of Christian belief and tests as to whether or not it is the world religion.

Department of Physics

PROFESSOR BERGER AND ASSISTANTS

Physics 8. The Teaching of Physics (Summer) 5 Hrs.

The course is based on Mann's, *The Teaching of Physics*. The work consists of lectures, reviews of numerous High School texts on Physics, and actual preparation, assignment, and teaching of assigned topics in High School Physics. Also, the student will be given information as to the best method of fitting up a laboratory.

Physics 9. General Physics (Fall) 4 Hrs.**Physics 10. General Physics (Winter) 4 Hrs.**

Physics 11. General Physics (Spring) 4 Hrs.

A year's work in collegiate physics. Not open to Engineering students. Prerequisites: Preparatory Physics and Physics 12. Class, 3 hours; laboratory, 2 hours.

No one will be recommended by the Department for Positions as Physics teachers who has not completed courses 8, 9, 10, and 11.

Physics 12. Freshman Physics (Spring) 2 Hrs.

This is a lecture and problem course intended to bridge the gap between High School Physics and Sophomore College Physics. The mathematics necessary for courses 9, 10 and 11 will be taken up in this course. Prerequisite: Preparatory Physics. Class, four hours.

Department of Political Science and Economics**PROFESSOR BINKLEY****POLITICAL SCIENCE****Political Science 1. Government and Politics (Fall) 3 Hrs.****Political Science 2. Government and Politics (Winter) 3 Hrs.****Political Science 3. Government and Politics (Spring) 3 Hrs.**

Begins with a brief survey of the origin of constitutional government in America followed by a somewhat detailed examination of our national and state governments; also a brief study of municipal and other local governments. Due emphasis is placed upon the organization and activity of political parties.

Political Science 4. Municipal Government (Fall) 3 Hrs.**Political Science 5. Municipal Government (Winter) 3 Hrs.****Political Science 6. Municipal Government (Spring) 3 Hrs.**

A comparative and historical study of the activities, functions and problems of European and American cities. Special emphasis is placed on recent tendencies toward change in the form of city government and on meeting the new problems arising therefrom. In studying the government of European cities special consideration is given to such features as may be used to advantage in the cities of the United States. The Spring Quarter is devoted to a thorough study of municipal functions and administration. Prerequisite: Political Science 1, 2 and 3.

Political Science 7. Comparative Government (Fall) 2 Hrs.**Political Science 8. Comparative Government (Winter) 2 Hrs.**

Political Science 9. Comparative Government (Spring) 2 Hrs.

A study of the problems of constitutional and popular government based upon a comparison of the modern constitutions of European, Asiatic and American States and with a view to testing our own constitutional principles and practice by such comparison. Prerequisites: Political Science 1, 2 and 3.

ECONOMICS

Economics 1. General Economics (Fall) 3 Hrs.

Economics 2. General Economics (Winter) 3 Hrs.

Economics 3. General Economics (Spring) 3 Hrs.

General introduction to a study of Economic questions. The theories underlying the various problems of economics are first dealt with, followed by a brief survey of the principles of foreign exchange, money, currency, banking, labor problems and other topics relating to the general subject.

Economics 4. Labor Problems (Fall) 2 Hrs.

Economics 5. Labor Problems (Winter) 2 Hrs.

Economics 6. Labor Problems (Spring) 2 Hrs.

A brief history of the problems and legislation connected with the labor question, followed by a more detailed study of the present day questions and the attempts being made to meet the problems which have arisen. Open to those who have taken, or are taking, Economics 1, 2, 3.

Economics 7. Money and Banking (Fall) 2 Hrs.

Economics 8. Money and Banking (Winter) 2 Hrs.

Economics 9. Money and Banking (Spring) 2 Hrs.

A study of money, its historical development, coinage, legal tender, the gold standard, index numbers and devices for stabilizing the dollar; credit; banking functions and operation; clearing house system; historical development of American and foreign banking systems and a special study of our national banks under the Reserve System. Prerequisites: Economics 1, 2, 3. (1923-24).

Economics 10. Economic History (Fall) 3 Hrs.

Economics 11. Economic History (Winter) 3 Hrs.

Economics 12. Economic History (Spring) 3 Hrs.

A study of the economic development of modern Europe with special reference to England, France and Germany; also a survey of the economic development of the United States. Primarily for pre-commerce students but open to all others.

Department of Psychology and Sociology

PROFESSOR GRAY

PSYCHOLOGY

Psychology 1. General Psychology (Fall) 3 Hrs.

Psychology 2. General Psychology (Winter) 3 Hrs.

These courses take up the general study of mental processes. They aim to train the student to observe the processes of his own experience and those of others, and to appreciate critically whatever he may read along psychological lines. It is introductory to all work in philosophy and pedagogy and is an important part of equipment for historical and literary interpretation. Prerequisite: One year of college work. Psychology I, Summer 1923.

Psychology 3. Psychology of Religion (Spring) 3 Hrs.

This is a study of a special subject based on a thorough elementary course in psychology. Three main topics will be treated: (1) The beginning of religion in the race. Special topics, primitive customs, ritual, taboo, sacrifice, prayer, myth, magic; (2) the beginning of religion in the individual, involving a study in adolescence, the types of religious experience, such as conversion and gradual growth; revivalism in the light of the psychology of suggestion compared with the educational process; (3) analysis of mature religious consciousness with reference to the nature and place of religious emotion and the character and function of religious ideas and concepts. Prerequisites: Psychology 1 and 2. (1924).

Psychology 4. Social Psychology (Spring) 3 Hrs.

The basis of the theory of social consciousness is derived from recent studies in gesture, language and instinct. Questions proper to this science are: (1) the genesis and development of consciousness in the family, gang, school, club, voluntary association and nation; (2) the social character of instinct, feeling, perception and thinking; (3) the interpretation of the crowd, fashion and custom; (4) political parties, the newspaper and the public will; (5) democracy and leadership. This course alternates with Psychology 3. Prerequisites: Psychology 1 and 2.

Psychology 5. Educational Psychology (Fall and Summer) 3 Hrs.

This course treats of the learning process and the methods of increasing its efficiency. Such topics as instincts and habits, economy in memory and association, attention, interest and the higher thought process, will be discussed. Prerequisites: Psychology 1 and 2 or Educational Psychology 1 and 2.

Psychology 6. Psychology of High School Subjects (Winter) 3 Hrs.

A study of the adolescent mind together with a comparative analysis of the theoretical and practical aspects of the subjects taught in the high schools. Prerequisite: Educational Psychology.

Psychology 7. Psychology of High School Subjects (Spring) 3 Hrs.

Continuation of Course 6. Summer 1923.

SOCIOLOGY**Sociology 1. General Sociology (Fall) 3 Hrs.****Sociology 2. General Sociology (Winter) 3 Hrs.****Sociology 3. General Sociology (Spring) 3 Hrs.**

A study of the phenomena of social life; the basis of society in nature; the social person; social institutions; social order and process. The course is designed to give an introduction to theoretical and practical sociology, and to systematize the reading, observation, and thinking of the student. Courses 1-2 are prerequisite to other courses in sociology. Prerequisite: Psychology 1 and 2.

Sociology 4. Rural Sociology (Summer) 3 Hrs.

This course presents those principles of social theory necessary to the study of rural social problems. And includes a careful presentation of the influence of physical environment upon rural progress. Social problems in the rural community are considered in their relations to the economic conditions of the farmer; the land question; the rural church; the rural school; means of communication, etc. These are correlated with like conditions in urban social life so that the student will have a broad view of our social conditions. Prerequisite: Psychology 1 and 2.

Sociology 5. Educational Sociology (Spring) 3 Hrs.

A study of the application of the scientific spirit, methods and principles of sociology to education. The social basis of the school in its relation to the home, community, church and state. The social value of educational surveys and vocational courses from the utilitarian viewpoint. Prerequisites: Sociology 1 and 2.

Electives from other Departments

In addition to the courses described above, candidates for degrees are allowed to present credits from the Departments of Law, Expression, or Engineering as follows:

Law. Constitutional Law, 10 hours.

Oratory. 10 hours.

Mechanical Drawing I. 4 hours.

Mechanical Drawing II. 2 hours.

Mechanical Drawing III. 2 hours.

Public Speaking, 3 hours.

COLLEGE OF EDUCATION

DR. JOHN DAVISON, DEAN

THE AIM

The College of Education of Ohio Northern University is devoted entirely to the instruction and training of teachers. The work of the College has been carefully and thoroughly organized and fully meets all the requirements of the State Department of Public Instruction and the standards maintained in the best colleges of the country. All professors and instructors have had successful public school experience as well as special preparation for their work and their ideal of service is a sympathetic co-operation with all students in helping to solve their immediate problems. Such a personal experience with strong educational leaders is the best and most valuable part of any course of instruction.

This college aims to give a sound and thorough knowledge of all the branches studied; to develop correct methods of investigation and research; to aid its students in forming clear conceptions of the dignity and importance of the teacher's work; to trace in the history of education the origin and development of modern principles of teaching; to present, in theory and practice, approved and rational methods of instruction; to create and maintain high professional standards among present and prospective teachers; and to offer such courses for the professional training of teachers as will broaden their horizon and advance them to higher planes of usefulness, ability and service.

The Ohio Northern University is on the "Accredited List" of the State Department of Public Instruction. Those who complete the Elementary and Secondary courses described in the following pages will be granted "provisional certificates" without further examination, and, after twenty-four months of successful teaching experience, the certificates may be made permanent by the State Board of Examiners.

Entrance Requirements

Only men and women of good moral character are admitted as students in the College of Education of the Ohio Northern University. The academic requirements for entrance

to courses leading to State Certificates in Ohio as fixed by the State Department of Public Instruction for all the Normal Colleges of the state, require graduation from a first grade High School, or its equivalent; and the necessary fifteen units will be accepted from first grade High Schools, Academies or Preparatory Schools. Persons desiring to pursue courses of study leading to diplomas or degrees must submit their High School or Preparatory credits to the Registrar before or at the time of entering the University.

Professional Training

For the sake of insuring the normal development of children and the conservation of the teacher's health, professional training as well as sound scholarship are now demanded of all who would secure positions in the teaching service. But whatever may be the legal requirements in Ohio or any other state, preference is always given by those in charge of the administration of Public Education in any community to the teachers who have made thorough preparation for their chosen work. There is a growing public sentiment in favor of eliminating the untrained, and this will necessarily result in better salaries and more favorable recognition for those who are worthy. Abundant opportunities are always open to teachers of superior qualification and recognized merit.

COURSES OF STUDY

"Four Year" Schedule for the Training of High School Teachers

Degree: Bachelor of Science in Education

FIRST YEAR		SECOND YEAR		THIRD YEAR	
English 1.	3	English 4.	3	General Methods	3
History of Education 1.	3	General Psychology 1.	3	Sociology 1.	3
Biology 1.	3	Principles of Secondary Education 1.	3	School Administration 1.	2
*Elective	6			Teaching or Elective	3
		*Elective	6	*Elective	4 or 5
English 2.	3	English 5.	3	Special Methods	3
History of Education 2.	3	General Psychology 2.	3	Sociology 2.	3
Biology 2.	3	Principles of Secondary Education 2.	3	School Administration 2.	2
Elective	6	Elective	6	Teaching or Elective	3
				Elective	4 or 5
English 3.	3	English 6.	3	Educational Hygiene	5
History of Education 3.	3	Educational Psychology 4.	3	Educational Sociology	3
Biology 3.	3	Principles of Secondary Education 3.	3	School Administration 3.	2
Elective	6	Elective	6	Teaching or Elective	3
				Elective	2
Drawing	3	Educational Psychology 5.	3	Educational Psychology 6.	3
Bible	3	School Law	2	Ethics	5
Elective	9	Observation	3	Elective	5
		Elective	5		

*Electives must be selected with reference to the subject or subjects which the student is preparing to teach. At least nine quarters should be devoted to the major subject, and six quarters to the minor subject.

This course may be completed in four college years of three quarters each, or in three years of four quarters each. In either case it represents one hundred and forty-four weeks of college work. Graduation from a first grade high school, or equivalent, is the requirement for entrance.

**Two Year Schedule for the Training of Elementary
School Teachers**

Diploma: Graduate in Pedagogy

FIRST YEAR		SECOND YEAR	
First Quarter		First Quarter	
Educational Psychology	2	Principles of Teaching	3
Geography and Methods	5	General Methods	2
Public School Drawing	3	History of Education	3
Rural Education	3	School Organization	2
		Observation or Practice	
		Teaching	3
		Elective	2
Second Quarter		Second Quarter	
Educational Psychology	2	Principles of Teaching	3
Arithmetic and Methods	5	General Methods	2
Grammar and Methods	5	History of Education	3
Reading and Methods	5	School Organization	2
		Observation or Practice	
		Teaching	3
		Elective	2
Third Quarter		Third Quarter	
Educational Psychology	3	General Methods	2
History and Methods	5	History of Education	3
Agriculture and Methods	5	School Organization	2
Educational Hygiene	5	Observation or Practice	
		Teaching	3
		Elective	5

As will be noted from the above, this course may be completed in six quarters of twelve weeks each. The requirement for entrance is graduation from a first grade high school, or equivalent.

All who have had two or more years of high school work are eligible to admission to the Summer School classes. All teachers in service are also admitted, by special direction of the State Department of Education.

DESCRIPTION OF COURSES

Educational Psychology

DEAN DAVISON, PROFESSORS GRAY AND WILSON

- Educational Psychology 1. Human Behavior (Fall) 2 Hrs.
- Educational Psychology 2. Psychology of Common Branches (Winter) 2 Hrs.
- Educational Psychology 3. Paidology (Spring) 3 Hrs.
- These are elementary courses, open to all Freshmen, and are designed to lay a foundation for all succeeding educational work. While the work of the three quarters is sequential and should be taken as outlined; it is offered in three units, any one of which may be taken separately if the student shall read the preceding texts and references.
- Educational Psychology 4. The Learning Process (Fall) 3 Hrs.
- Educational Psychology 5. Psychology of H. School Subjects I. (Winter) 3 Hrs.
- Educational Psychology 6. Psychology of H. School Subjects II. (Spring and Summer) 3 Hrs.

Courses 4, 5 and 6 are intended for high school teachers but are also open to students who have a working knowledge of psychological principles.

School Organization

DEAN DAVISON

- School Organization 1. Class Room Management (Fall) 2 Hrs.
- School Organization 2. School Government and Discipline (Winter) 2 Hrs.
- School Organization 3. School Law and Course of Study (Spring) 2 Hrs.

Although the work is planned for three consecutive quarters, any one may be selected by special students prepared to take the work.

School Administration

DEAN DAVISON

- School Administration 1. School Systems and Agencies (Fall) 2 Hrs.
- Study of existing school systems and the relations of the various agencies at work; comparative school legislation, with attention to Ohio; school management, financial problems, buildings and furnishings.
- School Administration 2. Secondary Education (Winter) 2 Hrs.
- Special study of courses of study, selection of teachers, reports, grading and records.
- School Administration 3. Vocational Education (Spring) 2 Hrs.

History of Education

DEAN DAVISON

- History of Education 1. Before the Middle Ages (Fall) 3 Hrs.
 History of Education 2. During the Middle Ages (Winter) 3 Hrs.
 History of Education 3. Modern Times (Spring) 3 Hrs.

History of Education 1, 2 and 3 are required of Seniors in both courses in education, but the outside readings are adjusted to the special interests of both classes of students. Open to Liberal Arts students who have had Psychology.

Principles of Elementary Teaching

PROFESSOR WILSON

- Principles of Teaching 1. The Educative Process (Fall) 3 Hrs.
 Principles of Teaching 2. The Teaching Process (Winter) 3 Hrs.

Elementary. A study of the principles of teaching based on psychology. The work is centered about the recitation and school room practice.

Principles of Secondary Education

DEAN DAVISON

- Principles of Education 1. Principles and Problems (Fall) 3 Hrs.
 Principles of Education 2. Principles and Problems (Winter) 3 Hrs.
 Principles of Education 3. Principles and Problems (Spring) 3 Hrs.

The principles of education founded upon psychology, biology and sociology are studied to final working basis. The dogmatical is not attempted, but a rational view-point towards present educational problems is emphasized. Open to Liberal Arts students who have had psychology, and who elect History of Education.

Methods of Teaching

DR. DAVISON AND PROFESSOR WILSON

- Methods of Teaching 1. General (Elementary) (Fall) 2 Hrs.
 Methods of Teaching 2. General (Elementary) (Winter) 2 Hrs.
 Methods of Teaching 3. General (Elementary) (Spring) 2 Hrs.

A careful study of the value of method in the educative process, and the methods suitable to the different grades and how they should be modified.

- Methods of Teaching 4. General (High School) (Fall) 3 Hrs.

This course is a study of a series of phases of the scientific methods of presenting high school subjects and checking on the results.

Methods of Teaching 5 Special. (Elementary) 5 Hrs.

The various elementary branches listed in the "Two Year" schedule are taken up with a view to gaining advanced academic knowledge and an acquaintance with the more improved methods of teaching them. Selected texts in both subject matter and methods are made the basis in each branch.

Methods of Teaching 6. Special (Secondary) (Winter) 3 Hrs.

Students taking this course will be divided into groups according to the subjects they are preparing to teach. Each student must prepare a thesis on the better methods of teaching in his chosen field. The material for this study will be based upon prescribed library readings, a practical study of the methods used by the instructors in the preparatory department, and local high school, and the counsel of the professor in charge.

Public School Drawing

PROFESSOR LONG

This is an elementary course based upon well established principles of expressing thought and action by symbols. No special talent is required to take this course, as the principles may be worked out mechanically. Required of all students wishing a diploma in Education. Given in Fall and Summer quarters. Three hours credit.

Public School Music

PROFESSOR KILLEEN

This course includes a thorough training in the fundamentals of music, frequent drill in sight singing, and careful provision for the teaching of music in all grades. Special attention is given to methods of instruction and the treatment of the child voice at all stages of development.

No extra charge for this special training in the music department. Fall or Summer quarters. Three hours credit.

Hygiene

DR. DAVISON AND PROFESSOR WILSON

Hygiene 1. Health and Sanitation (Spring) 5 Hrs.

This is a composite course comprising health work in the school including that of the teacher and pupils; a theoretical consideration of the intimate relation existing between mental and physical and moral growth. Prescribed readings, lectures, surveys. Open to all students in the School of Education who are prepared to carry the course.

Hygiene 2. Educational Hygiene (Winter)**5 Hrs.**

This course is pursued by Seniors taking the training of High School teachers. It includes health sociology, rural school health administration, medical supervision, school sanitation, play and recreation, and the teaching of the hygiene.

The Observation of Teaching

Through the co-operation of the Ada Public Schools and the preparatory department of the University, this work is accessible to all. Only a limited number, however, can be accommodated at one time, and special arrangement must be made as early as possible. It is advantageous to take the work daily, and attend a conference conducted by a training teacher. Credit is based upon attendance at the class, the weekly conference, and the nature of the reports. Three credit hours a quarter.

Practice Teaching

The cadet teachers train for the elementary work in the public schools. Those planning for secondary work teach in the preparatory department. As in Observation, only a limited number can be accommodated at once, and special arrangement must be made through the Dean. All work must be done by lesson plans under the immediate direction of the regular teacher in charge, and supervised by a training teacher. Credit is given to those only who show evidence of efficiency. The work is regarded as laboratory study, and only one hour a day will be recognized. Credit, three hours a quarter.

Full information regarding all elective courses, as well as the courses in English, Biology, Bible, General Psychology, Ethics, Sociology, etc., will be found elsewhere in this catalog in the description of the courses given in the College of Liberal Arts.

The Summer Quarter

The work of the Summer School is carefully organized and meets all the requirements of the State Dept. of Education.

For the summer of 1923, the work will be arranged to accommodate, first, those who wish to meet only the legal requirements; and, second, those who desire to complete a course leading to a diploma and state certificate. On the completion of the Elementary Teachers' Course of ninety-six term hours, "Certificates of Professional Instruction" are issued. Students desiring full collegiate credit must register at the beginning of

the summer quarter and continue their work during the entire quarter.

Lectures by eminent educational leaders of the country are regular features of the Summer School, and are free to the students of the University of whatever department.

Besides the regular academic and collegiate instruction, classes are formed in all the subjects prescribed by the State Department of Education for professional training and also in Home Economics, Physical Education and Rural Education. Arrangements have also been made for two full courses in primary methods, including plays, games, and so forth.

For further particulars send for a Summer School Bulletin.

Ohio Northern Educational Society

The Ohio Northern Educational Association holds regular weekly meetings, at which addresses and lectures are given and papers on subjects of vital importance to every teacher are read and discussed. Membership in this society is open to all students of the College of Education.

Employment Bureau

This Bureau assists Ohio Northern students in securing teaching positions. In the past year many graduates and former students were brought into direct communication with school officers in search of superior teachers. A number of superintendents and principals owe their present positions to direct calls to this bureau. The demand for teachers of science, agriculture, physical training and manual training was in excess of the properly qualified candidates.

No charge is made for the services of this bureau, but only teachers of merit will be registered.

COLLEGE OF ENGINEERING

CARROLL RUSSELL ALDEN, DEAN

ADMISSION

Fifteen units of high school work are required for admission. Distributed as follows: English, 3; Mathematics including solid geometry, 3; Physics, 1; Electives, 8; two to be chosen from the following list; English, Mathematics, Science, Language, History. Units will be accepted from first-grade high schools, academies or preparatory schools. The acceptance of work from schools of lower rank will be determined by the entrance committee. To those who cannot furnish certified credits, entrance examinations will be given the first day of each quarter. Those not desiring to earn a degree may enter any department and pursue the studies they choose, if on consultation, the head of the department is satisfied that they have sufficient preparation to pursue the work successfully. Such applicants are classified as special students. Upon completion of their work, a certificate, showing the course of study pursued and the amount of work covered, will be presented them.

The official form for "Certificate of Entrance," which may be had on application to the Entrance Examiner, should be used in all cases, in order to insure the presentation of necessary information.

Admission to Advanced Standing

A liberal policy is pursued in giving credit for work done in other colleges. Some credit also is given for practical experience in draughting and field work acquired previous to matriculation, upon receipt of a satisfactory statement from the employer, stating the nature of the work and length of service. Statements must include postoffice address as well as signature of employer.

Time to Enter

In view of the fact that each course is offered from two to four times a year and that numbers of classes are formed each quarter, students may enter at almost any time and find the work they desire. The best time to enter, however, is at the beginning of the quarter. See calendar.

Aim in Arrangement of Courses

The courses offered, recently revised to meet the demands of the reconstruction period, aim at laying a groundwork of sound theory and, at the same time, imparting such instruction in the usual professional practice as will equip the student for efficiency in any position to which he may be called. The technical branches are taught by scientifically trained teachers of experience in practical engineering.

By omitting subjects not directly bearing on Engineering, the time required in other technical schools for completing the work leading to a degree is shortened in Ohio Northern. An engineering degree is thus placed within the reach of thousands of young men whose circumstances will not permit them to spend the longer period of four years in preparing for a vocation.

To accommodate those desiring the culture gained through the study of the "liberal arts and sciences" in addition to the thorough technical training, the College of Liberal Arts is open to all Engineering students free of extra tuition.

Options

With the advice and consent of the professor in charge, certain subjects may be elected in the various courses to take the place of such as may not appeal to the student in his chosen vocation.

CIVIL ENGINEERING

This is the parent stem of all engineering pursuits, and in its broader sense includes all branches of engineering. Many of its former departments have grown into separate professions, yet there still remains a broad and important field, offering greater opportunities than ever before. No sharp line of distinction can be drawn between the provinces of the civil, electrical, and mechanical engineers. This is evidenced by the large number of subjects studied in common by all the students of the various engineering departments.

The subjects given in the department of Civil Engineering are divided into five groups. Every candidate for a B. S. in C. E. degree must take all the subjects in Group I. The candidate may then select any one of the remaining four groups in which to complete his work. It will be noticed that in each of the remaining four groups appears an item, "elective." The student may choose these from any of the groups, or from one of the other engineering departments, or with the consent of the Dean, from one or more of the other colleges of the University.

Practically all the local improvements are under the direct supervision of the College of Engineering. Many thousands of dollars have been expended the past few years for street paving, macadamizing, sewerage, etc., the major portion of the engineering work being done by the students themselves.

The college is supplied with high-grade instruments and appliances necessary for first-class instruction and practice. The laboratories are well equipped, the draughting room large and modern, the scientific library excellent.

Schedule

FIRST QUARTER

Col. Alg. I.	5
Trigonometry	5
Mech. Draw. I.	4
Chem. I.	4
Gym.	1

SECOND QUARTER

Col. Alg. II.	4
Anal. Geom. I.	4
Mech. Draw. II.	2
Chem. II.	4
Physics IV.	5
Gym.	1

THIRD QUARTER

Calc. I.	4
Mech. Draw. III.	2
Anal. Geom. II.	4
Chem. III.	4
Physics V.	4
Gym.	1

FOURTH QUARTER

Calc. II.	4
Desc. Geom. I.	5
Engineering Problems	4
Plane Surveying	5
Gym.	1

FIFTH QUARTER

Calc. III.	4
Physics VI.	5
Field Engr.	5
Hyd. I.	5
Gym.	1

SIXTH QUARTER

Mech. of Mtls. I.	5
Hyd. II.	4
Geol.	3
Rail Roads I.	3
Gym.	1

SEVENTH QUARTER

Mech. of Mtls. II.	3
Test. Mat.	2
Masonry	3
Options.	10

EIGHTH QUARTER

Stresses II.	4
Graphics	5
Reinf. Conc.	3
Contracts	5

NINTH QUARTER

Stresses II.	4
Br. Des. I.	3
Highway Eng.	3
Option	8

TENTH QUARTER

Br. Des. II.	3
Foundations	3
Estimates	2
Masonry Des.	3
Option	7

Total Required ----- 157
 Group Options ----- 23

180

Physical Education Credits exclusive of 180 required hours.

CIVIL ENGINEERING GROUPS

REQUIRED		OPTIONS	
GROUP I.		GROUP II	
MATHEMATICS		GENERAL	
Col. Alg. I, II, III.....	9	Railroads II.....	3
Trigonometry.....	5	Reinforced Concrete II.....	3
Analytic Geometry I, II.....	8	Elementary Electric Mach. I.....	5
Descriptive Geometry I.....	5	Design of Dams.....	3
Calculus I, II, III.....	12	Irrigation and Drainage.....	3
		Electives.....	6
			180
SCIENCE		GROUP III	
		SANITARY	
Chemistry I, II, III.....	12	Sewerage.....	3
Physics IV, V, VI.....	14	Reinforced Concrete II.....	3
Geology.....	3	Water Supply.....	4
Engineering Problems.....	4	Advanced Chemistry.....	5
		Electives.....	8
			180
DRAWING		GROUP IV	
Mech. Drawing I, II, III.....	8	STRUCTURAL	
APPLIED		Descriptive Geometry II.....	2
Graphics.....	5	Mill Buildings.....	3
Stresses I, II.....	8	Higher Structures.....	5
Bridge Design I, II.....	6	Reinforced Concrete II.....	3
Mechanics of Materials I, II.....	8	Metallurgy.....	2
Hydraulic I, II.....	8	Electives.....	8
Masonry.....	3		180
Masonry Design.....	3	GROUP V	
Reinforced Concrete I.....	3	MATHEMATICAL	
Foundations.....	3	Least Squares.....	2
Testing Materials.....	2	Geodesy.....	2
Highway Engineering.....	3	Astronomy.....	3
Estimates.....	2	Field Astronomy.....	2
Law of Contracts.....	5	Differential Equations.....	3
Plane Surveying.....	5	Analytic Mechanics.....	5
Field Engineering.....	5	Electives.....	6
Rail Road I.....	5		180
	157		

ELECTIVES—Electives may be chosen from the other groups or from the other Engineering Departments or from the Colleges of Law, or Liberal Arts, or Commerce. The electing of such subjects must meet the approval of the Dean.

ELECTRICAL ENGINEERING

The courses offered in this branch of Engineering require a thorough study of theoretical and applied electricity.

The first half of the prescribed study is, in the main, the same as that in the Civil and Mechanical Engineering curriculums, including the fundamental engineering sciences, mathematics, drawing and surveying. The last half consists of courses of study in stresses, graphics, strength of materials, hydraulics, steam engines, advanced study in the theory of electricity, a large amount of laboratory research and experiment, shop tests, plant testing, meter testing, machine drafting and designing, power plant and wiring layouts, and a thorough course in electrical machine design.

All courses given in the schedule are required except those listed under "Options" and "Electives".

The theoretical work is supplemented with practical application in the laboratory and in the operation of power plant machinery. Throughout, the student is drilled in the solution of many numerical problems with a view to a firm grasp of the theory.

In addition to an excellent Physical Laboratory, the department has a well-equipped Electrical Laboratory. A gas engine-driven electric lighting system has been installed for lighting the University buildings and grounds, and for driving the ventilating motors. The University power plant comprises one gas engine unit and semi-Diesel oil unit. To prevent interruption to the service, storage batteries have been installed. These batteries are available for test, and form an important addition to the laboratory equipment. In the laboratory, both direct and alternating currents are available for testing purposes.

The recent enlargement of the laboratory and the additional equipment have made it possible to accommodate a large number of students.

A complete steam heating and electric power plant is being installed for operation beginning with the opening of the heating season 1922.

This plant includes high pressure steam boilers, steam engines, turbines and a complete water system. Students in the colleges of Electrical and Mechanical Engineering are required a certain amount of power plant operating experience including power plant testing.

Schedule

FIRST QUARTER		SECOND QUARTER	
Col. Alg. I.....	5	Col. Alg. II.....	4
Trigonometry	5	Anal. Geom. I.....	4
Mech. Draw I.....	4	Mech. Draw. II.....	2
Chem. I	4	Chem. II	4
Gym.	1	Physics IV	5
		Gym.	1
THIRD QUARTER		FOURTH QUARTER	
Chem. III	4	El. Elec. Mach. I.....	4
Anal. Geom. II.....	4	El. Elec. Mach. I (Lab).....	1
Mech. Draw. III.....	2	Calculus II	4
Calculus I.....	4	Descriptive Geometry	5
Physics VI	5	Physics V	4
Gym.	1	Gym.	1
FIFTH QUARTER		SIXTH QUARTER	
Elec. Machines I.....	5	Elec. Machines II.....	5
Calculus III	4	Mechanics of Mat'ls I.....	5
El. Elec. Machines II.....	5	Elec. Machines V.....	5
El. Elec. Machines Lab. II.....	4	Mechanism	4
Gym.	1	Gym.	1
SEVENTH QUARTER		EIGHTH QUARTER	
Mechanics of Mtls II.....	3	Elec. Machines VII.....	5
Elec. Machines VI.....	5	Elec. Machines III.....	4
Elec. Machines IV.....	5	Machine Design I.....	4
Elec. Power Plants.....	5	Thermodynamics	5
NINTH QUARTER		TENTH QUARTER	
Hydraulics I	4	Advanced A. C.	5
Differential Equations	3	Hydraulic Machinery or	
Elec. Machines IX.....	5	Hydraulics II	4
Steam Turbines	4	Elec. Machines VIII.....	4
Shop Projects	2	Electives	4
		Seminar	1
OPTIONS		ELECTIVES	
10 hours required		Telephone Engineering	4
Graphics	5	Electric Power Plants	4
Elec. Mach IV.....	5	Electric Railways	4
Elec. Mach VIII	5	Electric Meters	4
One required		Steam Power Plants.....	4
Hyd. Mach'y	4	Power Plant Operation.....	4
Hyd. II	4	Steam Boilers	3
		Gas Engines	5
		Plane Surveying	5
		Other Colleges	9

Physical Education Credits exclusive of 180 required hours.

MECHANICAL ENGINEERING

Mechanical Engineering deals with the transformation and transmission of energy, and with the theory and construction of mechanism and machinery.

The first half of the curriculum consists of the basic engineering studies. In the latter half an exhaustive study is made of all phases of heat engineering, together with the design, erection and maintenance of power plant apparatus. Thorough training is given in machine drafting, machine design, thermodynamics, steam engines, steam boilers, gas engines, electrical machinery and steam power plants.

The University has its own gas-engine-driven lighting plant and a central steam heating plant, lighting and heating all the University buildings. This equipment is installed with special convenience for making tests on boilers, heating apparatus and power apparatus.* In addition the central heating and lighting plant of the Ada Heating and Light Co., with its equipment of Diesel engines, high pressure water pumps, et cetera, is open to the students for inspection and test.

* See the University Power Plant, page 83.

A well equipped machine shop recently added to the laboratory outfit, gives opportunity for training in the use of tools and general machine shop practice.

FIRST QUARTER

College Algebra I.....	5
Trigonometry	5
Mech. Drawing I.....	4
Chemistry I	4
Gym.	1

THIRD QUARTER

Anal. Geometry II.....	4
Calculus I	4
Mech. Drawing III.....	2
Chemistry III	4
Physics VI	5
Gym.	1

FIFTH QUARTER

Calculus III	4
Hydraulics I	4
Thermodynamics	5
El. Elec. Mach. II.....	5
Gym.	1

SECOND QUARTER

College Algebra II.....	4
Anal. Geometry I.....	4
Mech. Drawing II.....	2
Chemistry II	4
Physics IV	5
Gym.	1

FOURTH QUARTER

Calculus II	4
Desc. Geometry I	5
Physics V	4
El. Elec. Mach. I.....	4
Gym.	1

SIXTH QUARTER

Anal. Mech.	5
Steam Power Plants I.....	4
Mech. of Matls. I.....	5
Mechanism	4
Gym.	1

SEVENTH QUARTER

Mech. of Matls. II.....	3
Steam Power Plants II.....	3
Plane Surveying	5
Graphics	5
Valve Gears	2

EIGHTH QUARTER

Stresses I	4
Gas and Oil Engines.....	3
Mach. Design I.....	4
Machine Shop	3
Metallurgy	4

NINTH QUARTER

Steam Turbines	4
Heat and Vent. and Ref.....	5
Mach. Design II	4
Testing Matls	2
Mech. Laboratory I.....	3

TENTH QUARTER

*Hydraulic Mch.	4
Gas Engine Des.....	4
Mech. Laboratory II.....	3
Elective	6

*Hydraulics II may be substituted for Hydraulic Machinery.
Physical Education Credits exclusive of 180 required hours..

CHEMICAL ENGINEERING

The aim is to thoroughly acquaint the student with the fundamental principles of chemical science, and to afford him a complete drill in analysis and in the preparation of inorganic and organic products, and thus to enable him to attack and solve the many chemical and metallurgical problems evolving from the rapid development of the industries.

Schedule

FIRST QUARTER

Col. Algebra I	5
Trigonometry	5
Mech. Drawing I.....	4
Chemistry I	4
Gym.	1

SECOND QUARTER

Col. Algebra II	4
Analyt. Geom. I.....	4
Mech. Draw. II.....	2
Chemistry II	4
Physics IV	5
Gym.	1

THIRD QUARTER

Calculus I	4
Physics VI	5
Mech. Draw. III	2
Analyt. Geom. II.....	4
Chemistry III	4
Gym.	1

FOURTH QUARTER

Calculus II	4
Physics V	4
Qual. Chemistry I.....	5
El. El. Mach. I.....	4
Gym.	1

FIFTH QUARTER

Qual. Chem. II.....	5
Thermodynamics	5
Hydraulics I	4
El. El. Mach. II.....	5
Gym.	1

SIXTH QUARTER

Mech. of Mat. I.....	5
*Hydraulics II	4
Chem. Stochiometry	4
*Des. Geom. I.....	5
Gym.	1

SEVENTH QUARTER

*Mech. of Mat. II.....	3
Ind. Inorg. Chem.	4
*Plane Surveying	5
*Graphics	5

EIGHTH QUARTER

*El. Mch. I.....	5
Org. Chem. I.....	5
Water Supply	4
Metallurgy	4

NINTH QUARTER

Quan. Chem.	5
Org. Chem. II.....	5
*El. Mach. II	4
Geology	3

TENTH QUARTER

Mechanism	4
Analyt. Chem.	4
Estimates	2
Ind. Org. Chem.....	5
College Rhetoric	3
Thesis	

Twenty-five hours of the subjects marked with an (*) may be made optional from the following courses.

Physical Education Credits exclusive of 180 required hours.

STRUCTURAL DRAFTING

Many young men for reasons, financial or otherwise, do not aspire to the longer courses leading to a degree, but would gladly avail themselves of the opportunity to prepare themselves to enter the busy "Structural Field." For such this schedule has been arranged, on completion of which a certificate will be granted. There is no preparation other than the grades necessary to enter this course.

Schedule

FIRST QUARTER

	Hours
Algebra I.	5
English Composition	5
Mechanical Drawing I.....	4
Geometry I.	5

THIRD QUARTER

	Hours
Algebra III.	5
Geometry III.	5
Mechanical Drawing III.....	2
Descriptive Geometry I.....	5
Business English	4

SECOND QUARTER

Algebra II.	5
Geometry II.	5
Preparatory Rhetoric I.....	5
Mechanical Drawing II.....	2
Physics I.	5

FOURTH QUARTER

Algebra IV.	5
Machine Drawing I.....	4
Descriptive Geometry II.....	2
Graphic Statics	5
Trigonometry	5

DEGREES

The University is empowered to grant the customary scholastic degrees.

The management accepts grades of equal value from other institutions of learning, yet the applicant for a degree is required to do at least 45 hours of work here. No diploma is granted on grades made wholly in other institutions.

On hundred and eighty credit hours are required for graduation, two hours of field or laboratory work counted one credit hour.

THESIS

Every candidate for a degree must prepare a thesis upon some technical or scientific study, which lies within the field of the degree sought, and may be either designing, constructing, testing or research; the study to be selected by the professor in charge and the subject to be announced not less than twenty-four weeks preceding graduation.

The form of the finished thesis must be in accordance with the requirements of the department and the library and be deposited with the Dean at least four weeks before the conferring of the degree.

SEMINAR

Weekly conferences are held for the purpose of discussing current engineering events and topics.

STUDENT TECHNICAL ORGANIZATIONS

The Ohio Northern Chapter of the American Association of Engineers holds bi-monthly meetings. All engineering students are eligible to membership. Proceedings of the American Association of Engineers are received and discussed.

The Ohio Northern Society of Chemical Engineers holds bi-monthly meetings. All students of Chemical Engineering are eligible for membership. Technical papers pertaining to chemical engineering are read and chemical and metallurgical subjects are discussed.

The Ohio Northern Branch of the American Institute of Electrical Engineers hold bi-monthly meetings. All electrical students are eligible to membership. At these meetings, original papers and papers printed in the proceeding of American Institute of Electrical Institute are read and discussed.

The Ohio Northern Chapter of Mechanical Engineers hold meetings bi-monthly. All students of Mechanical Engineering

are eligible to membership. New developments in the field of mechanical engineering are investigated and discussed.

In honor of George Washington, "Surveyor, Soldier, Statesman," the societies named above devote the week of February 22, to a series of Technical Lectures, Annual Exhibit, Annual Banquet, etc.

EXPENSES

See earlier pages of this bulletin.

DESCRIPTION OF COURSES

For description of courses and daily schedule of classes see special Engineering Bulletin.

COLLEGE OF LAW

WILLIAM PRICE HENDERSON, DEAN

When Organized

The College of Law was organized as a department of the University in 1885, and numbers among its alumni and former students many of the most prominent lawyers of Ohio and other states. Its graduates have been uniformly successful as applicants for admission to the bar and as practitioners.

Its Purpose

The aim of its founders was to afford an opportunity for students of limited means, to secure a collegiate training in law, and by connection with the University to offer to them the added opportunity of obtaining the general education indispensable to the successful study and practice of law. With this in mind, tuition rates are made very reasonable, and every effort is put forth to accommodate the student of limited means, but earnest purpose.

The courses are planned primarily to train students for the practice of law, but they may advantageously be pursued by anyone desiring to secure a knowledge of the principles and history of law, either as part of a liberal education, or as part of the foundation of a business career, and special attention is given to the needs of such students.

In the training of students for the practice of law, the college has four chief aims:

(a) To give a thorough, systematic grounding in the history and fundamental principles of the law.

(b) Subordinately, but as an essential feature of the work of the college, to give special instruction preparatory to examinations for admission to the bar. This special instruction consists of a thorough quiz and review of the whole course, and covers a period of about three months. It is given twice each year before June and December bar examinations and is open to all students, whether they have taken the regular courses in this College of Law or some other Law School. Many students who have studied under a preceptor in an office avail themselves of this instruction.

(c) To impart a working knowledge of statute law and court practice and procedure, to the end that the young lawyer may intelligently and readily serve his clients.

(d) To inculcate the principle of legal ethics and of the lawyer's public responsibility, to the end that the young lawyer may take his proper place as a leader in his community.

Equipment

The College of Law occupies commodious rooms in the new Lehr Memorial building. Its good working library is now larger and better suited to the work of the College than ever before in its history, several important and valuable sets, including the American Digest System and Lawyer's Reports Annotated, both series and a set of the best edition of the United States Supreme Court Reports, having been added recently.

Outline of Courses

(In the following outline, the figure preceding the name of the course indicates the number of the course; that following, the number of credit hours given for the satisfactory completion of the course. A credit hour is given for the satisfactory completion of work requiring one class period a week for one quarter.)

FIRST YEAR

Fall Quarter	Winter Quarter	Spring Quarter
Contracts I. ---5 Hrs.	Contracts II. ---5 Hrs.	Agency -----5 Hrs.
Personal Property and Sales ---5 Hrs.	Domestic Relations -----5 Hrs.	Quasi-Contract 3 Hrs.
Torts -----5 Hrs.	Bailments ---3 Hrs.	Criminal Law and Procedure ---5 Hrs.
	Partnership ---5 Hrs.	History, Origin, and Sources of Law -----3 Hrs.

SECOND YEAR

Fall Quarter	Winter Quarter	Spring Quarter
Real Property I.----- -----5 Hrs.	Real Property II.----- -----5 Hrs.	Administration of Estates ----3 Hrs.
Private Corporations -----5 Hrs.	Wills -----5 Hrs.	Municipal Cor- porations ---5 Hrs.
Insurance ---3 Hrs.	Suretyship ---4 Hrs.	Negotiable Instru- ments -----5 Hrs.
Damages -----3 Hrs.	Conflict of Laws----- -----3 Hrs.	Trusts -----5 Hrs.

THIRD YEAR

Fall Quarter	Winter Quarter	Spring Quarter
Constitutional -----4 Hrs.	Constitutional Law II.-----4 Hrs.	Legal Ethics ----1 Hr.
Pleading I. ----5 Hrs.	Pleading II. --5 Hrs.	Brief Making and
Equity I. -----5 Hrs.	Equity II. -----5 Hrs.	Use of Law Books,
Bankruptcy ---3 Hrs.	Evidence -----5 Hrs.	General Review and Quiz---15 Hrs.

Lectures are given on legal ethics, legal history, international law and court practice.

135 credit hours required for graduation.

Method of Instruction

Each subject scheduled in the course of study requires for its completion five recitation periods of one hour each, per week throughout the quarter, except where otherwise indicated.

The instruction is based upon the text assigned for study, combined, in the second and third years, with a judicious use of cases, and completed, in the third year, with a thorough "quiz," under the personal instruction of the dean, preparatory to examinations for admission to the bar.

The recitation includes a thorough questioning of the student upon the text and cases studied and informal discussions by instructor and students, with constant reference to the statutes and leading cases of the jurisdiction, the whole exercise aiming to combine a knowledge of the history and fundamental principles of the law with its actual application to cases, thus giving the student a thorough grasp of the law, not only in its development, but as it now exists.

Moot Court

Moot Court, under the direct supervision of the faculty, forms a regular part of the work, in which each student is expected to participate. He is required to get out all the papers necessary for the case, and to follow the customary order of procedure. Pleadings, writs, motion and journal entries, together with the principles of proceeding in appeal and error, are supervised in detail; juries are chosen, witnesses examined,

motions heard, and everything is made to conform as nearly as possible to the practice of the regular courts.

Admission

Students may enter the College at anytime, but, in order to receive full credit toward graduation, for work done, must enter at the beginning of a quarter.

At the beginning of the college year 1917-1918, the following rules as to the admission to the College became effective:

Candidates for a degree will be required, upon their application for admission, to furnish satisfactory evidence of graduation from a first-grade high school, or from a school of equivalent standing.

Students not candidates for a degree may enter upon proving, to the satisfaction of the Dean, that they possess such general education as will enable them to pursue the study of law intelligently. Special effort will be made, as in the past, to offer such students every reasonable advantage, and special attention will continue to be given to the needs of special students who are preparing for the examinations for admission to the bar.

Preliminary to Bar Examination

The preliminary literary work required for admission to the Bar examination may be taken in the University under the regular law tuition, and a certificate showing the completion of the course in the Preparatory School admits the student to the Bar examination in this state, without a preliminary examination.

Graduation

The degree of Bachelor of Laws is conferred on students who have completed the prescribed course of study.

The following conditions as to graduation will be enforced:

Credit toward graduation will be given for not more than one year's study of law under the actual tuition of a reputable practicing attorney at law. Such study must be proved by the certificate of such attorney at law not only as to the length

of time spent in study but as to the subjects studied, the text or case books which formed the basis of the study, and the quality of the work done by the student.

Credit toward graduation will be given for not more than two year's study of law in residence in any reputable law school in the United States maintaining a three years' course of study, and proper credit will be given for study in residence in any reputable law school in the United States maintaining a course of study less than three years in length.

No credit will be given for correspondence school work.

No student will be graduated who has not studied law for a period equivalent to nine college quarters, of which time a period equivalent to at least six quarters must have been spent in residence at some reputable law school, and of which at least the last three quarters must have been spent in residence in this College of Law.

Students not candidates for a degree may select from the courses offered such work as they desire, with the approval of the dean, not to exceed a maximum of 20 credit hours per quarter.

The summer quarter is a full quarter a twelve weeks. Full courses in the College of Law are offered under the instruction of members of the regular faculty, and full credit is given for work done in this quarter. This quarter offers an excellent opportunity for teachers, and others who are unable to be in attendance during the remainder of the year, as well as for regular students who wish to complete their course in less than three calendar years, or to make special preparation for bar examinations. Quiz classes, in preparation for such examinations, are formed regularly as part of the work of this quarter, and classes are formed in such of the other regular courses as may be necessary, to meet the demands of students.

Expenses

For expenses see earlier pages of this bulletin.

COLLEGE OF PHARMACY

RUDOLPH HENRY RAABE, DEAN

Advantages Offered Here

Under the Laws of Ohio, a School of Pharmacy in good standing is (1) one that demands for entrance the certificate of preliminary education issued by the entrance examiner of the State Board of Pharmacy; (2) that has a two-year course covering at least fifty weeks actual instruction occupying two school years with at least two months elapsing between the two years. Each school year must cover at least 250 clock hours of class room instruction and 350 clock hours individual laboratory work, and cover at least the work outlined in the "1913 Syllabus."

The College of Pharmacy of the Ohio Northern University established in 1885, with constantly added facilities and enlarged plans, is preparing men and women to meet fully, not only the legal requirements, but also the increasing public demand for educated and trained pharmacists.

Practical and thorough courses are offered at the least expenditure of time and money; equipment, courses offered and facilities for work are modern.

Excellent opportunity for registered "Assistants," if graduates of a recognized college, who wish to review for examination as "Pharmacists."

Young women admitted on an equality with young men.

The Ohio Board of Pharmacy grants recognition to the graduates of the O. N. U. College of Pharmacy.

Standardized courses means that our graduates are recognized in nearly every state; full recognition in Pennsylvania, New York and Indiana.

Laboratories

In addition to the general biological, chemical and physical laboratories of the University the College of Pharmacy has two Pharmaceutical and Dispensing laboratories. The desk arrangement is such as to afford the student every facility for complete and thorough work, and the tables are supplied with an entire outfit of apparatus, including storing closet.

The laboratory for practical chemical work is equipped with all the accessories necessary for chemical analysis and

synthesis. In this laboratory the student is required to perform a satisfactory amount of analytical and synthetical work under the personal attention of the Professor of Chemistry and an able assistant.

The Microscopical Laboratory is equipped with fine instruments for individual microscopic investigation.

Requirements for Admission

Applicants for admission to the regular course leading to the degree of Graduate in Pharmacy must present a certificate of preliminary education from the Entrance Examiner of the State Board of Pharmacy.

The State Board of Pharmacy announces as follows:

"The following preliminary educational credentials shall be sufficient: On and after January 1, 1920, a diploma from a legally constituted high school, normal school or academy, issued after at least four years of study." Persons who actually entered recognized colleges prior to Jan. 1, 1920, will be permitted to continue their courses without procuring another entrance certificate.

Those wishing to pursue the three-year's course of study leading to the degree of Pharmaceutical Chemist (Ph.C.) must present an entrance certificate from the State Examiner.

Persons wishing to pursue the four-year course of study leading to the degree of Bachelor of Science in Pharmacy (B. S. in Pharm.) must present an entrance certificate from the State Examiner.

Students from other recognized Colleges of Pharmacy will be admitted to advanced standing upon satisfactory evidence that they have met all the requirements established by this college to attain such standing.

When to Enter

The College of Pharmacy opens on Tuesday, September 11, 1922, and continues thirty-six weeks, with an intermission at Christmastide.

The student shall enter the College of Pharmacy on opening date and attend the introductory exercises unless excused by proper authorities. To enter the regular courses the student

must present an entrance certificate from the State Examiner, matriculate, and pay tuition and fees as stated elsewhere in this catalogue.

Special students may enter at any time upon recommendation of the Dean and approval of the President.

Students who are entitled to advanced standing will enter at the time arranged by the Dean.

Schedules

Degree: Pharmaceutical Graduate

FIRST YEAR

Physiology	5	General Materia Medica.....	1
General Inorganic Chem. I.....	4	Pharmaceutical Botany I.....	5
Pharmaceutical Arithmetic.....	5	General Inorganic Chem. II.....	4
Pharmaceutical Technique	2	Pharmaceutical Latin	3
		Posology	1
		Pharmaceutical Botany II.....	5
		General Inorganic Chem. III.....	4
		Pharmacy I.	5

SECOND YEAR

Pharmacognosy I.	5	Pharmacognosy II.	5
General Organic Chem. I.....	5	General Organic Chem. II.....	5
Pharmacy II.	5	Materia Medica II.....	5
		Quantitative Analysis I.....	5
		Pharmacy IV.	5
		Pharmacy III.	5

At least 1308 clock-hours are required to complete this course, 540 clock-hours, in lectures and recitations, and 768 clock-hours in laboratory.

Degree: Pharmaceutical Chemist

FIRST YEAR

Physiology	5	General Materia Medica.....	1
General Inorganic Chem. I.....	4	Posology	1
Pharmaceutical Arithmetic.....	5	Pharmaceutical Latin	3
Pharmaceutical Technique	2	General Inorganic Chem. II.....	4
		Pharmaceutical Botany I.....	5
		Pharmaceutical Botany II.....	5
		General Inorganic Chem. III.....	4
		Pharmacy I.	5

SECOND YEAR

Pharmacognosy I.5	Pharmacognosy II.5
General Organic Chem. I.5	General Organic Chem. II.5
Pharmacy II.5	Pharmacy III.5
Materia Medica II.5	
Quantitative Analysis I.5	
Pharmacy IV.5	

THIRD YEAR

Materia Medica I.5	Materia Medica III.2½
Qualitative Analysis I.5	Toxicology2½
Pharmacy V.5	Qualitative Analysis II.5
	Pharmacy VI.5
Materia Medica Section	
(elective)5	
Organic Chemistry III.5	
Special Chemistry (elective)5	
Pharmacy VII. or elective5	

At least 1980 clock-hours are required to complete this course, 828 clock-hours in lectures and recitations and 1052 clock-hours in laboratory.

Degree: Bachelor of Science in Pharmacy

FIRST YEAR

Physics IX.4	Biology II.3
Biology I.3	Physics X.4
German or French5	German or French5
General Inorganic Chem. I.4	General Inorganic Chem. II.4
Biology III.3	
German or French5	
Physics XI.4	
General Inorganic Chem. III.4	

SECOND YEAR

Physiology5	General Materia Medica1
General Organic Chem. I.5	Posology1
Pharmaceutical Arithmetic5	Pharmaceutical Botany I.5
Pharmaceutical Technique2	Pharmaceutical Latin3
General Organic Chem. II.5	
Pharmaceutical Botany II.5	
General Organic Chem. III.5	
Pharmacy I.5	

THIRD YEAR

Pharmacognosy I.	5	Pharmacognosy II.	5
Qualitative Chem. I.	5	Qualitative Chem. II.	5
Pharmacy II.	5	Pharmacy III.	5
Materia Medica II.	5		
Quantitative Chemistry I.	5		
Pharmacy IV.	5		

FOURTH YEAR

Materia Medica I.	5	Materia Medica III.	2½
Elective Chemistry	5	Toxicology	2½
Pharmacy V.	5	Elective Chemistry	5
		Pharmacy VI.	5
Elective in Materia Medica			
Section	5		
Elective Chemistry	5		
Pharmacy VII.	5		

A least 2652 clock-hours are required to complete this course, 1116 clock-hours in lectures and recitations and 1536 clock-hours in laboratory.

DESCRIPTION OF COURSES**Materia Medica Section**

Physiology. 5 Hrs.

A brief course in human physiology preparatory to the study of the action of drugs. The digestive, circulatory, respiratory and nervous systems are the chief subjects considered. Lectures and recitations, 36 hours. Laboratory 48 hours.

General Materia Medica. 1 Hr.

In this course the student becomes acquainted with the general classification of drugs and medicines. Classification is based upon dynamics. Lectures and recitations, 12 hours.

Pharmaceutical Botany I. 5 Hrs.

The aim of this course is to acquaint the student with the main group of plants, their characteristics, and economic importance. The course is progressive, beginning with the lowest types, and ending with the highest. Lectures and recitations, 36 hours. Laboratory, 48 hours.

Pharmaceutical Botany II. 5 Hrs.

The cell, cell contents and general anatomy of the parts of the plants, such as root, stem, leaf, flower, fruit and seed, are the subjects of this course. A few drugs from each classification will be considered. Lectures and recitation, 36 hours. Laboratory, 48 hours.

Posology.

5 Hrs.

This is a brief course intended to familiarize the first year student with the science of dosage. Lectures and recitations, 12 hours.

Pharmacognosy I.

5 Hrs.

In this course the student is taught how to identify, select, and value drugs microscopically. He will learn the official names, definition, habitat and constituents of each drug studied. Lectures and recitations, 36 hours. Laboratory, 48 hours.

Pharmacognosy II.

5 Hrs.

This is a continuation of Pharmacognosy I. Attention will be given to preservation, adulteration and identification of powdered drugs. A liberal use of the compound microscope is required in this course. Lectures and recitations, 36 hours. Laboratory 48 hours.

Materia Medica I.

5 Hrs.

A course in inorganic Materia Medica. Special attention will be given to official names, physiological action and doses. The physical and chemical properties of these drugs will receive attention in so far as they influence their action. Lectures, recitations, 36 hours. Laboratory, 48 hours.

Materia Medica II.

5 Hrs.

This is a course in organic Materia Medica (vegetable). The organic drugs will be classified according to their action upon the human body. Attention will be given to official names, constituents, action and dosage. Lectures and recitations, 60 hours.

Materia Medica III.

2½ Hrs.

A course in organic Materia Medica (animal). These drugs will be classified zoologically. Attention will be given to official names, definitions, sources, action and dosage. Lectures and recitations, 18 hours. Laboratory, 24 hours.

Toxicology.

2½ Hrs.

A study in the principles of poisoning, classification of poisons, and effects of each class. Lectures and recitations, 30 hours.

Biological Assaying.

5 Hrs.

Attention will be given to biological assaying methods and standardization of the U. S. P. drugs that are most satisfactory valued by this method. Lectures, recitations, 12 hours. Laboratory, 96 hours.

Bacteriology.

A course in pharmaceutical bacteriology will be offered in connection with the department of biology upon demand of a sufficient number of students.

Chemistry Section

Chemistry 1. General Inorganic Chemistry	4 Hrs.
Chemistry 2. General Inorganic Chemistry	4 Hrs.
Chemistry 3. General Inorganic Chemistry	4 Hrs.

These three courses constitute the first year of work in general chemistry. In Courses 1 and 2 a thorough study of the non-metallic elements and their compounds is made. The metallic elements and their compounds are considered in Course 3. Balancing equations by the bond method and basic analysis are included in this course. Each of these courses is given every quarter of the year. They must be taken in the sequence above. Three hours lecture and recitation and four hours laboratory. McPherson and Henderson text.

Qualitative Analysis I.	5 Hrs.
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A course in inorganic Qualitative Analysis. Prerequisites: General Inorganic Chemistry I, II and III. The greater portion of this course is devoted to laboratory practice.

Qualitative Analysis II.	5 Hrs.
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This is a continuation of Qualitative Analysis I.

General Organic Chemistry I.	5 Hrs.
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A study of the structure and constituents of the carbon compounds; the hydro-carbons and carbohydrates with many of the addition and substitution products. Lectures and recitations, 60 hours.

General Organic Chemistry II.	5 Hrs.
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General Organic Chemistry III.	5 Hrs.
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This is a continuation of General Organic Chemistry I. Lectures and recitations, 24 hours. Laboratory, 80 hours.

Quantitative Analysis I.	5 Hrs.
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Quantitative Analysis II.	5 Hrs.
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This work consists of Volumetric and gravimetric analysis; the determination of acidity and alkalinity; the analysis of organic and inorganic salts. Lectures, 12 hours. Laboratory, 96 hours.

Physical Chemistry.	5 Hrs.
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Industrial Chemistry.	5 Hrs.
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Special Chemistry.	5 Hrs.
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Under this head are grouped several electives, viz., analysis of drugs and chemicals, coal and coke, iron and steel, cement, ores and others.

Pharmacy Section

Pharmaceutical Arithmetic. 5 Hrs.

A course in calculation pertaining to Pharmacy. The student is taught current weights and measures. Metric system, English system, proportion, alligation, specific gravity and specific volume, comparison of thermometer scales, are the chief topics. Special attention is given to the metric system of weights and measures, and their relationship with the English system of weights and measures. Lectures and recitations, 48 hours. Laboratory, 24 hours.

Pharmaceutical Latin. 3 Hrs.

A course covering such essentials of inflection and syntax as to familiarize the student with the etymology and construction of the nomenclature used in the United States Pharmacopoeia and National Formulary and to enable him to read prescriptions. Lectures and recitations, 36 hours.

Pharmaceutical Technique. 2 Hrs.

An introductory course in the principles upon which pharmaceutical operations are based. Lectures, demonstrated lectures and recitations, 36 hours.

Pharmacy I. Galenical. 5 Hrs.

The chief topics of this course are waters, infusions, decoctions, syrups, mucilages, spirits, tinctures, fluid extracts, and other classes of preparations of quite similar nature. Lectures and recitations, 36 hours. Laboratory, 48 hours.

Pharmacy II. Galenical. 5 Hrs.

This course is a continuation of Pharmacy I. Attention is given to those official preparations which require skill and careful manipulation. Mixtures, emulsions, liquors and certain acids, are the chief topics. Lectures and recitations, 36 hours. Laboratory, 48 hours.

Pharmacy III. Dispensing. 5 Hrs.

This is a course in extemporaneous pharmacy. Prescriptions, compounding and dispensing prescriptions, and incompatibilities are the chief subjects of this course. The student will be given a liberal opportunity to compound actual prescriptions. Lectures, 12 hours. Recitations, 12 hours. Laboratory, 72 hours.

Pharmacy IV. Commercial. 5 Hrs.

Bookkeeping, Business Correspondence, Commercial Law, Salesmanship, Pharmaceutical Laws and business practice, are some of the subjects offered under this heading. See schedule for electives.

- Pharmacy V. 5 Hrs.
Manufacture and standardization of inorganic pharmaceuticals. Lectures, 12 hours. Laboratory, 96 hours.
- Pharmacy VI. 5 Hrs.
Manufacture and standardization of tinctures, fluid extracts and extracts. Lectures 12 hours, laboratory 96 hours.
- Pharmacy VII. 5 Hrs.
Manufacture of pharmaceuticals on the commercial basis. Lectures and recitations. Inspection of certain manufacturing plants will be required.
For courses in Language, Mathematics, Biology and Physics, see description of courses under College of Liberal Arts.

Requirements for Graduation

To receive the degree of Pharmaceutical Graduate (Ph.G.), the candidate must be of good moral character and must have satisfactorily completed the two-year course of study.

To receive the degree of Pharmaceutical Chemist (Ph.C.), the candidate must be of good moral character and must have satisfactorily completed the three-year course of study.

To receive the degree of Bachelor of Science in Pharmacy (B.S. in Pharm.), the candidate must be of good moral character, and must have satisfactorily completed the four-year course of study.

As a further condition of graduation all candidates for the Ph.G. degree must be in resident study in this college at least two quarters, for the Ph.C. degree at least one year and for the B. S. in Pharm. degree at least one year, together with credits issued by other recognized colleges.

THE PREPARATORY SCHOOL

FRANKLIN LEWIS BERGER, DIRECTOR

FACULTY

ALBERT EDWIN SMITH, D.D., Ph.D.
President

FRANKLIN LEWIS BERGER, A.B., B.S.

RICHARD HOLMES SCHOONOVER, A.M.
Greek, Latin, Rhetoric

GEORGE ANDERSON, D.D.
English, History

EUNAH JOHNSON, A.B.
Mathematics, French

JESSE RAY HARROD, B.S.
Physics

ANDREW SCOTT STAUFFER, B.S.
Biology

Purpose

The Preparatory School is organized for the purposes of (1) preparing students for college entrance, (2) affording an opportunity to any desiring to complete the work commonly required in first class high schools.

The course of study in the preparatory school is arranged to meet the usual requirements for college entrance, the minimum of which is fifteen units. The unit consists of five recitations per week for three quarters. Each recitation period is fifty-five minutes in length, two laboratory periods counting as one recitation period.

If a student, on completing the preparatory curriculum, desires to enter college elsewhere, a certificate is issued, showing that the entrance work has been finished. The Preparatory School is accredited as the equivalent of a first grade high school by the State Department of Education of Ohio.

Admission

Students are admitted at the beginning of any quarter, although it is to the student's advantage to enter at the beginning of the fall quarter.

Requirements for Graduation

Sixteen units are required for graduation.

Beginning Sept. 11, 1922, two units of Latin will be required of all desiring diplomas.

English	3	History	1
Foreign Language	2	Science	1
Mathematics	2		

At least 4 additional units must be selected from the following subjects, the number indicating the maximum number of units that will be accepted in any subject.

English	4	Mathematics	3
Latin	4	Physics	1
Greek	3	Chemistry	1
French	3	Phys. Geography	1
German	3	Botany	1
Spanish	3	Zoology	1
History	4		

Not more than three units may be presented from the following subjects:

Mechanical Drawing -----	1	Stenography -----	1
Domestic Science -----	1	Typewriting -----	$\frac{1}{2}$
Commercial Geography -----	1	Music -----	$\frac{1}{2}$ or 1
Physical Geography -----	$\frac{1}{2}$	Commercial Law -----	$\frac{1}{2}$
Manual Training -----	1		

Course of Study

	FIRST QUARTER	SECOND QUARTER	THIRD QUARTER
First Year	Latin I. Algebra I. Grammar Anc. and Med. Hist. I.	Latin II. Algebra II. Composition I. Anc. and Med. Hist. II.	Latin III. Algebra III. Composition II. Anc. and Med. Hist. III.
Second Year	Caesar I. Biology I. Rhetoric I. Mod. Hist. I.	Caesar II. Biology II. Rhetoric II. Mod. Hist. II.	Caesar III. Biology III. Rhetoric III. Mod. Hist. III.
Third Year	Cicero I. or Modern Language Plane Geom. I. Amer. Lit. I. Amer. Hist. I.	Cicero II. or M. L. Plane Geom. II. Amer. Lit. II. Amer. Hist. II.	Cicero III. or M. L. Plane Geom. III. Amer. Lit. III. Civics
Fourth Year	Virgil I. or M. L. Algebra IV. Physics I. English Lit. I.	Virgil II. or M. L. Algebra and Geom. IV. Physics II. English Lit. II.	Virgil III. or M. L. Geom. V. Physics III. English Lit. III.

The Curriculum

The amount and quality of work done in the various subjects taught is intended to meet the requirements of the North Central Association of Colleges and Secondary Schools.

Expenses

The tuition is \$34 per quarter, or \$100 for the regular school year of 36 weeks.

Room and board may be had at most reasonable rates. Good rooms cost from \$1.50 to \$2.50 per week. Board by the week costs from \$4.00 to \$5.00 per week. The University owns and operates a splendid cafeteria for the benefit of the student body.

Aid to Students

Loan Fund. The Board of Education of the Methodist Episcopal Church lends money to members of that church taking a regular course in school, who have been in attendance long enough to merit a recommendation from the Faculty. No interest is charged if the debt is paid within five years from the time of leaving school, but a payment of \$5.00 each year must be made on the principal, after the applicant quits school. The only security required is a recommendation from a quarterly conference. Loans are made at the beginning of each quarter. Application should be made two weeks before the opening of the quarter and no applicant can be received later than the close of the first week of the quarter. The maximum amount allowed to each applicant is \$100 a year. An applicant must have been in attendance at least one quarter.

Work. Many students in the University earn a part of their expenses by working as waiters, janitors, and at other occupations in the town and vicinity.

Registration

The first duty of the new student is to matriculate. He then receives a registration card which he takes to the director of the preparatory school. The director indicates on the card the subjects assigned for the quarter. The student then takes

the card to the treasurer, pays his tuition and other fees, and is given a duplicate of his registration card as a receipt and ticket of admission to his classes.

Discipline

Each student is expected to conduct himself as a good citizen of the school. The student is required to attend every class exercise. If absent from any class exercise, the student must get a blank form from the registrar and indicate on it the date and reason for his absence. This must be handed to the instructor at once. A committee on absences acts on these at the close of each quarter, and may or may not grant excuse for such absence. Each unexcused absence reduces the credit hours for the quarter one-fifth hour for each absence.

A student making "Cn" or "F" in half or more of his assigned work for any quarter, will be denied future registration unless he petitions the faculty and gains their consent for registration.

Marks and Examinations

The grade marks are Excellent, Good, Average, Passing, Conditioned, Failure. These marks carry also the following quality points:

Ex., 3; G, 2; Av., 1; P, 0; Cn., -2; F, -3.

Examinations are held regularly at the close of each quarter. Mid-term examinations are given at the discretion of each instructor.

Amount of Work Allowed

The student is allowed to carry 20 hours of class work per week unless his work is of high enough character to justify his carrying more hours. If the student has in excess of 25 quality points earned the preceding quarter, he may register for 25 hours, provided that no subject is marked conditioned or failed.

Advantages

If the student is industrious and attentive, he may carry 25 hours of work. This will enable him to complete the entire course in nine quarters. Because the school is in session during the summer, the student may complete the entire preparatory course in one term more than two years. This represents a great saving of time and money.

Because of the connection of the preparatory school with the University, the student enjoys peculiar and valuable privileges. Among these may be mentioned the three literary societies, the Y. M. C. A., the Y. W. C. A., the college library, excellent laboratories, physical training under experienced instructors, and supervision of his work by regular college instructors.

Reports

Reports will be furnished to parents or guardian at any time on request.

SCHOOL OF COMMERCE

EMMET ELIJAH LONG, DIRECTOR

Aim

The School of Commerce aims to prepare young men and women to "do things" in the realm of commercial activity.

Location and Equipment

This School occupies the entire third floor of Lehr Memorial, equipped throughout with up to date fixtures and office furnishings for class use, Remington typewriters, Burrough's adding machine, posting machine and calculators, and all appliances needed in efficient instruction. The quarters are roomy, with abundance of light, ventilation and toilet conveniences.

The Courses of Study

The courses of study, thorough and practical, are arranged to meet the needs of young men and women planning to enter fields of business organization and administration or upon clerical, stenographic, secretarial or commercial teaching careers.

Time Required

It requires about three quarters (nine months) to complete the short course either in Bookkeeping or Stenography, the length of time depending upon previous educational preparation, aptness and application; the two years course in Commerce, about six quarters; the Commercial Teachers' Normal Course, six quarters; the Pre-Commerce Course, six quarters. Students are promoted as rapidly as they advance, but no student is permitted to enter a higher or advanced class until all prerequisite work has been completed.

Degrees and Diplomas

Students completing the Commercial Teachers' Normal course are granted a diploma with the rank, "Graduate of Pedagogy in Commerce;" persons completing the two years course are ranked "Graduate in Commerce;" student completing the shorter courses are certified and graduated with the rank, "Graduate in Bookkeeping" and "Graduate in Stenography," respectively.

Special Students

The regular courses have been arranged for those who have completed high school or preparatory work. Students not having had such preliminary training, or those not caring to complete a prescribed course will be admitted as special students. Certificates showing amount of work completed will be issued to special students. These credits may be applied on regular courses later, should they become candidates for graduation.

When to Enter

Students are admitted at the beginning of each quarter. Many of the subjects scheduled in the two short courses, the two years course, and the Teachers' Normal course are repeated each term.

In the Summer quarter an excellent opportunity is given for teachers and those unable to attend during the other months of the year to pursue the course desired.

See calendar on the second page of the catalogue.

Situations for Students

Positions are not guaranteed, but the Employment Bureau of the University cheerfully assists graduates and students qualified for positions. There is no charge for this except the necessary postage.

The O. N. U. Commercial Club

The Commercial Club is a live organization maintained by the students and faculty of the School of Commerce. It meets regularly and discusses the many phases of business activity and commercial topics.

University Advantages

The University offers to every student of the School of Commerce additional privileges: Admission to courses in the College of Liberal Arts without extra charge when prerequisites have been met; the opportunity of participating in literary work in the three literary societies; and the benefits of college environment and associations.

Teachers' Normal Commercial Training

The Commercial Teachers' Normal Course, outlined hereafter, meets the present legal requirements for accrediting, and the School is authorized to announce that the State Department will recognize all graduates and will grant, without further examination, a four-year provisional certificate to teach commercial subjects in the public high school and educational institutions.

Short Course in Bookkeeping

FIRST QUARTER	SECOND QUARTER	THIRD QUARTER
Accounting I.5	Accounting II.5	Com. Arith.5
English I.3	Bus. English4	Accounting III.5
Economic Hist.3	Typewriting II.2	Salesmanship3
Rapid Cal.1½	Economic Hist. II.3	Business Org.2
Typewriting I.2½	Com. Law4	Economic Hist.3
Penmanship2		Spelling2
	18	20
19		

Students desiring credit for Bookkeeping done elsewhere must present the books representing the work done including the blanks or sets, or prove the amount and nature of the work done, or pass an entrance examination at the discretion of the instructor. This applies to all the schedules of the School.

Short Course in Stenography

FIRST QUARTER	SECOND QUARTER	THIRD QUARTER
Stenog. I.5	Stenog. II.5	Stenog. III. and
Typing I.2½	English II.3	Typing5
English I.3	Typing II.2½	Office Pract.2
Spelling2	Bus. Eng.4	Com. Corres.4
Penmanship2	Com. Law4	Salesmanship3
Accounting I.5		Shorthand
	18½	Principles3
19½		17

Two Year Course in Commerce

(Rank—Graduate in Commerce. Prerequisite:
A high school education.)

FIRST YEAR

FIRST QUARTER	SECOND QUARTER	THIRD QUARTER
English I. -----3	English II. -----3	Accounting III. ----5
Economic Hist. ----3	Economic Hist. II.---3	Economic Hist. III.---3
Accounting I. -----5	Accounting II. -----5	Salesmanship -----4
Rapid Cal. -----1½	Commercial Law----4	Commercial Arith. --5
Penmanship -----2½	Elective -----3	Bus. Org. -----2
Spelling -----2		
	18	19
17		

SECOND YEAR

FIRST QUARTER	SECOND QUARTER	THIRD QUARTER
Accounting IV.-----5	Stenography II.-----5	Stenography III.
Stenography I.-----5	Typewriting II. --2½	with Typewriting
Typewriting I. ---2½	Business English ---4	and direct
Modern Language --5	Modern Language --5	Dictation -----5
		Commercial Cor-
17½	16½	respondence -----4
		Office Practice -----2
		Modern Language---5
		Shorthand
		Principles -----3
		19

Economics may be substituted for Modern Language with consent of the Director.

Machine Bookkeeping and Calculator courses may be substituted for Accounting IV.

100 hours are required for graduation. Students having completed part of this work in high school must take an equivalent number of hours of college work to be selected by the Director.

Students pursuing the Two Year course are advised to arrange for remaining steadily at the work for six successive terms, if possible beginning with the Fall quarter.

Commercial Teachers' Normal Course

(Diploma—Graduate in Pedagogy in Commerce. Prerequisite:
Graduation from a first grade high school or its equivalent.)

FIRST YEAR	SECOND YEAR
FIRST QUARTER	FIRST QUARTER
Educational Psychology -----2 Accounting I. -----5 Penmanship -----2½ Rapid Calculation -----1½ Business English -----4 <div style="text-align: right;">15</div>	Principles of Secondary Education I. -----3 General High School Methods ---3 Stenography I. -----5 Typewriting I. -----2 Accounting IV. -----3 <div style="text-align: right;">16</div>
SECOND QUARTER	SECOND QUARTER
Educational Psychology II. ---2 Accounting II. -----5 Commercial Arithmetic -----5 Commercial Law -----4 <div style="text-align: right;">16</div>	Principles of Secondary Education II. -----3 Special Methods in Teaching Bookkeeping -----3 Stenography II. -----5 Typewriting II. -----2 Advanced Accounting and Auditing -----2 Professional Elective -----3 <div style="text-align: right;">18</div>
THIRD QUARTER	THIRD QUARTER
Educational Psychology III. ---2 Accounting III. -----5 Com. Correspondence -----4 Salesmanship -----4 Business Org. -----2 <div style="text-align: right;">17</div>	Practice Teaching -----5 Special Methods in Teaching Stenography -----3 Stenography III. with Typewriting -----5 Observation -----2 Secretarial Work -----2 <div style="text-align: right;">17</div>

One hour class-room exercise, five days the week, on work previously prepared, counts 5 credit hours.

One hour instruction on the laboratory plan, five days the week, counts 2½ credit hours.

Length of class-exercises, fifty-five minutes.

Maximum number of hours permitted a week, eighteen; minimum, fifteen.

Description of Courses

Accounting I. This course, planned for beginners in Accounting, gives the student the fundamental principles of bookkeeping. He becomes acquainted with a variety of books used by a single proprietor conducting a retail business. Offered each quarter.

Accounting II. This is a partnership course, introducing features used in a modern office; the budget system is presented. Open to all students having completed Accounting I., or its equivalent. Offered each quarter.

Accounting III. A theoretical and practical course, dealing with the questions of the modern corporation. Special column corporation accounting books are used in connection with the Cash Journals. (Budget System). Offered each quarter.

Business English. A thorough course in practical business letter writing, including postal and general office information. Required in all courses.

Commercial Correspondence. A continuation of work begun in Business English, with emphasis on collection, follow-up, adjustment, sales, credit and form letters.

Spelling. Regular and systematic drills are given in written and oral spelling in all courses. Students are required to take these drills and pass satisfactory examinations.

Advanced Arithmetic. Classes in advanced Arithmetic are formed in the College of Education in which students pursuing the short courses of the School of Commerce take a thorough review of that subject at the beginning of the course.

Commercial Arithmetic. Emphasis is placed on the solution of all kinds of problems met in transaction of business. Thorough from beginning to end.

Rapid Calculation. Drill in speed and accuracy in figures. The training is such that a student in carrying out extensions in invoices and statements, and computing discounts, is able to do it in large part mentally.

Commercial Law. The essentials of law from a business standpoint so presented as to enable one to know and defend his rights.

Shorthand. Thorough instruction in the principles by both individual and class methods, followed by practice in receiving dictation covering all lines of business, with speed, accuracy, phrase and word-sign drills, until the student is able to do practical office work.

The Gregg System is taught to all beginners. Those having learned the principles of another system, if able to take dictation, are allowed to enter the dictation classes and write their own systems.

Typewriting and Multigraphing. All students pursuing regular courses in the School of Commerce are required to take training in the operation of the typewriter. The Touch system is taught, the instructor supervising the work during every period. Drills are given in every phase of the work required of typewriters.

Typewriting is required to be done in the Typewriting Department. Those taking typewriting elsewhere must present their papers for grades and take examinations, for which a fee of \$4.00 is charged.

Students deformed in hands or arms are permitted to elect an equal amount of instruction in some other subject with the approval of the Director.

Secretarial Duties. Practical training in secretarial work, including the performance of these duties, under direction of the instructor for the Deans of the University, Executive Secretary and others requiring the service of secretaries from time to time.

Penmanship and Lettering. The Zaner system of writing is used, with the advantage of modern methods of instruction. The writing is easily read, rapidly written, simple in forms, natural in slant, easy of movement, and pedagogically taught.

All students in the School of Commerce are admitted to the classes in business writing without extra charge.

Lettering, including display cards, price tickets, decorative designs, etc., is taught to students desiring this kind of instruction.

Machine Bookkeeping. With a Burrough's Bookkeeping Machine students are trained in the Mechanical Bookkeeping systems, which are rapidly supplanting pen and ink methods in thousands of banks and business offices of the country.

Calculating Machine Work. The school is equipped with a battery of Burroughs Calculators. These machines are used in offices of thousands of business concerns for handling all kinds of figure work.

Without previous business experience of any kind students are able to become expert Calculator operators after a very brief course of study.

Professional Subjects in Education. For those preparing to teach commercial subjects. Principles of education, history of education, educational psychology, school management, school law, general and special methods, observation and practice teaching, and such other subjects as are required by the State Department of Public Instruction. For detailed description, see College of Education.

College of Law Subjects. Sales, contracts, partnership, agency. See College of Law.

Liberal Arts Subjects. Psychology, Sociology, Economics, Spanish, German, French. See College of Liberal Arts.

Pre-Commerce Course, see College of Liberal Arts.

TUITION—PENMANSHIP

Ornamental penmanship, pen drawing, card writing and show card writing, one hour per day, per quarter-----\$4.50

General penmanship free to students of all departments.

All students in the School of Commerce are admitted to courses in the College of Liberal Arts without extra charge, if the prerequisites to such courses have been met.

For further information regarding tuition and fees of this department see Expenses, earlier pages of this bulletin.

A. D. JULLIARD SCHOOL OF MUSIC

FREDERIC THOMAS KILLEEN, DIRECTOR

Aim

The music department of the Ohio Northern University stands ready to give solid, fundamental training in the various branches and to advance its students to a graduation creditable to them and to the University. The school is equally suited to those specializing in music and to those desiring to avail themselves of certain of its advantages, while following some other line of university work.

Equipment

The lower floor of Music Hall is used for teachers' studios, a reception room and a small recital hall. The upper floor is given over entirely to pupils' practice rooms. They are well lighted, heated and ventilated and equipped with pianos of standard make.

Lehr Auditorium, equipped with a grand piano and a new pipe organ, furnishes an excellent place for public recitals and concerts.

DEPARTMENTS AND COURSES

Voice

First Year. A thorough knowledge of breathing and breath control; exercises in breathing and tone placing; in agility and relaxation of muscles; Ferdinand Sieber's eight measure studies and the ten studies, Op. 44-49; simple songs, carefully selected to assist the pupil in conquering his difficulties.

Junior. Exercises in agility, uniting of the tones; the swell, mezzo voce, embellishments; studies in the Masterpieces of Vocalization, which is a graded series of vocal studies selected from the works of all the great masters of singing; songs of suitable grade.

Senior. Advanced exercises in agility covering all kinds of scales and chords in both major and minor; mezzo voce, trill; exercises for strengthening the voice. Advanced work in the Masterpieces of Vocalization.

Throughout the course carefully selected songs and arias from the best American, English, French and Italian writers are used. While songs in foreign tongues are often taught in the language in which composed, special care is taken to give the pupil a clear and intelligible enunciation of the English language.

It is advised that voice pupils study French and Italian.

Pianoforte

Instruction in piano playing involves a special adaptation to the needs of the individual pupil. A minute study of each student's deficiencies and previous habits of work is made and technical studies and selections best adapted to his needs are given him. Music is a means of intellectual culture and artistic enjoyment; the works of the best masters are therefore employed through all grades.

First Year. Bach, Little Preludes. Two-part Inventions. Kuhlau Clementi Sonatas. Schools of Velocity by Berens, Czerny, etc. Jensen and Cramer Etudes. Doring Octave Studies. Sonates by Hayden, Clementi, Mozart, Beethoven, etc. Selected Pieces.

Junior. Bach, Three-part Inventions. Preludes and Fugues, Well-tempered Clavichord. Clementi's Gradus ad Parnassum, Czerny, Op. 740. Sonates by Mozart and Beethoven. Compositions by Mendelssohn, Schubert, Grieg, MacDowell, etc.

Senior. Daily Studies, Czerny. Octave Studies, Kullak. Solo works of greater difficulty by Schuman, Chopin, Liszt, Henselt, Moszkowski. Concertos by Mozart, Hummel, Mendelssohn, St. Saens, Grieg, etc.

Courses for Children. The object of these courses is to induce parents to send their children to school at an early age, where they can be under competent instruction from the start, and where they may be assured that no time will be lost in entering upon their advanced work.

The policy of the school throughout is not to adhere strictly to any one so-called "method"; the instructors, after careful study, have selected the best features in various methods, and offer to the students a course of training unexcelled in any conservatory.

It is the endeavor to make the study of piano interesting to the child and to keep practice from becoming mere drudgery. High ideals are set before him and the foundation is laid for a broad musical knowledge.

Organ

The courses of study provides for thorough training in preparation for church and concert work. The course has been arranged to give a knowledge of the French schools of organ music through the study of the works of the best composers in this particular school.

First Year. Stainer's Organ Primer. Bach Chorales. Studies by Merkel and Whiting. Easy Hymns.

Second Year. Rheinberger Trios. Eight Short Preludes and Fugues by Bach. Nilsson Pedal Studies. The easier pieces by Guilmant, Dubois, Batiste, Faulkes, Lemare and others. Hymns of any difficulty.

Junior. Trios by Bach. Preludes and Fugues by Bach. Chorale Preludes, Sonates by Mendelssohn. Pieces of medium difficulty by Guilmant, Dubois, Gigout, Widor, Lemare, Hollins, etc.

Senior. Preludes and Fugues, Books III. and IV., Bach. Sonates by Guilman, Gigout, Thiele, Lemmens.

Violin

First Year. Violin methods of Polanaski, Schraedick and DeBeriot; Etudes of Alard and Kayser; O'Senick, School of Bowing Technique; Solos by Dancila, Sitt, Bohn, Seity, et cetera.

Junior. Etudes of Blumenstengel, Mazas, Dont; Technique Prepartoire of Sevcik; Concertos of DeBeriot, Viotti, Krentzer; Solos, Oberstass of Wienianiski, Andante and Scherzo of David, Ballade et Polanaise of Vieuxtemps, Russian Airs of David.

Senior. Etudes of Krentzer, Fiorillo and Rode; Techniquial Studies of Sevcik and Schraedick; Concertos of Bruch, Spohr, Mendelssohn and Mozart; Sonatas of Handel and Beethoven; Solos, Zigennerfeisen of Sarasate; Marzurka of Musin; Romances of Beethoven; Suite of Sinding.

Theory, History and Ear Training

The Course in Theory is twelve weeks long, classes reciting twice a week. It includes the elements of Acoustics and Tone Quality; a description of the Orchestra and its Instruments; Accent, Rhythm and Tempo; Outlines of Motive Transformation and Thematic Treatment; Explanation and Analysis of Musical Form; Textbook, "Theory of Music" by Louis C. Elson; the text is supplemented by work in other texts and additional analysis of form.

The Course in Ear Training is twenty-four weeks long, and is a requirement of all first year harmony students. In this class the pupil is taught to recognize by ear and express in writing, rhythms, intervals, melodies, chords, chord progressions and modulations.

The work is carefully graded from the simplest studies in the major scale to those involving difficult problems in both rythm and intervals. In general, the course follows the textbook, "Ear Training" by A. E. Heacox.

The Course in Musical History is thirty-six weeks long, beginning with the fall quarter or at other times if a sufficient number desire it. Classes meet twice a week.

The aim of the course is to trace the art of music from its beginning to its present date. Much time is devoted to the lives of the greatest composers and to a careful study of representative works of each. Due consideration is also given to the development of the larger forms. The text used is "History of Music" by W. S. Pratt and this is supplemented by letters and collateral reading.

Harmony

The text used in this course is "Lessons in Harmony" by Heacox and Lehmann, supplemented with collateral texts and reference books. The four quarters of work in this subject required for graduation are as follows:

First Quarter. A thorough knowledge of keys, scales, signatures, intervals, and triads gained by frequent oral and written drill. Simple part writing from given bases and sopranos. Playing of cadences at the piano.

Second Quarter. Dominant and supertonic seventh chords. Modulation begun. Dominant ninth. Other chords of the seventh. Writing of original hymn tunes.

Third Quarter. Modulation to nearly related keys. Advanced studies in secondary seventh chords. Chromatically altered chords.

Fourth Quarter. Modulation to remote keys. Enharmonic changes. Suspensions, retardations, appoggiaturas, anticipation, passing tone, embellishment, pedal point.

Counterpoint

Simple Counterpoint in two parts, in all species and combinations. Three part counterpoint in first, second and third species. Completion of three part Counterpoint; for part Counterpoint; Imitation. The textbook used in Counterpoint is "Simple Counterpoint" by F. J. Lehmann. Prerequisite: Harmony I. II. III. IV.

Harmonic Analysis

The one quarter of work of this subject required for graduation is devoted to a study of the text "Harmonic Analysis" by F. J. Lehmann.

GRADUATION

To finish any of the courses (Voice, Piano or Organ) with credit usually requires four years of work, the exact time depending upon the talent and industry of the pupil. No pupil is allowed to finish with fewer than two lessons a week during the senior year. A diploma is awarded upon the satisfactory performance of a public recital and the completion of work indicated in the following outline:

Voice. Harmony, 3 quarters; Musical History, 3 quarters; Theory, 1 quarter; Ear-Training, 2 quarters; enough Piano to play accompaniments.

Piano. Harmony, 4 quarters; Harmonic Analysis, 1 quarter; Counterpoint, 1 quarter; Musical History, 3 quarters; Theory, 1 quarter; Ear-Training, 2 quarters; Voice or Violin, 3 quarters.

Organ. Harmony, 4 quarters; Harmonic Analysis, 1 quarter; Counterpoint, 1 quarter; History of Music, 3 quarters; Theory, 1 quarter; Ear-Training, 2 quarters; 3 quarters Voice 3 quarters; creditable knowledge of Piano.

Violin. Harmony, 4 quarters; Harmonic Analysis, 1 quarter; Counterpoint, 1 quarter; History of Music, 3 quarters; Theory, 1 quarter; Ear-Training, 2 quarters; Piano, 3 quarters.

Post Graduate Work given in all departments.

TEACHERS' COURSE

This course is especially for those pupils who are not gifted as performers but are qualified to teach. Those completing the Teachers' Course are not required to give a public graduating recital, but will render a suitable program at one of the Tuesday evening recitals.

The theoretical subjects for this course are the same as for the diploma course, and in addition the student will be required to take nine hours pedagogical work.

PUBLIC SCHOOL MUSIC

Supervisor's Course

Diploma: Graduate in Public School Music

FIRST YEAR

Fall Quarter

Elements of Music	3
College English I.	3
Introductory Psychology	2
History of Music	3
Singing	2
Piano	2
Physical Training	1
Chorus	1

Winter Quarter

Elements of Music	3
College English II.	3
Educational Psychology	2
History of Music	3
Singing	2
Piano	2
Physical Training	1
Chorus	1

Spring Quarter

Elements of Music	3
College English III.	3
Educational Psychology	2
History of Music	3
Singing	2
Piano	2
Physical Training	1
Chorus	1

SECOND YEAR

Fall Quarter

Advanced Singing	2
Advanced Piano	2
Harmony	2
Class Management in Music	2
Methods in Pub. School Music	3
Principles of Teaching	3
Observation and Practice	2
Chorus	1

Winter Quarter

Advanced Singing	2
Advanced Piano	2
Harmony	2
Course of Study and Class Management	2
Methods in Pub. School Music	3
Principles of Teaching	3
Observation and Practice	2
Chorus	1

Spring Quarter

Advanced Singing	2
Advanced Piano	2
Harmony	2
School Administration	2
General Methods in Music	3
History of Education	
Modern	3
Observation and Practice	
Teaching	3
Chorus	1

RECITALS

Pupils' Recitals. Pupils' recitals are held usually once a week to enable the student to gain confidence and exhibit the progress he has made.

Faculty Recitals. At intervals the faculty of the College of Music presents a program of such nature as to further the education and standards of the students.

Artists' Recitals. By means of these recitals the pupils come in contact with the great musical personalities and hear the best music, well performed.

MUSICAL ORGANIZATIONS

Choral Society. The Choral Society is made up of both university students and townspeople and is open to all who love good music. The society meets every Monday evening that school is in session during the first three quarters. The fees charged are nominal. The society aims to give two public performances each year.

Men's Glee Club. A glee club of twenty-four voices is organized, for the purpose of giving home concerts and touring the state each year.

Girls' Glee Club. This club is organized to learn the best in choral works written for female voices, and to give concerts each year.

Orchestra. A large orchestra is being organized to take up standard works of the great composers, and to play at the concerts of the Choral Society.

Band. A splendid band under the direction of Sig. Michael Mazzula is maintained, affording an opportunity for study and practice to students playing a brass or reed instrument.

Choirs. Choir work is of marked value in a musical education. All advanced voice students should take advantage of its benefits.

The churches of the town welcome students to their choirs.

RUDIMENTS AND SIGHT SINGING

A course in Rudiments and Sight Singing is given twice a year—in the fall quarter and in the summer quarter. The class meets twice a week and is free to all university students.

TUITION

Voice, Piano, Organ or Violin, quarter of twelve weeks, two lessons a week-----	\$22.00
One lesson a week-----	14.00
For either of the six-weeks summer terms, Voice, Piano, etc., two lessons a week-----	14.00
One lesson a week-----	8.00

Children's Department

Piano, quarter of twelve weeks, two lessons a week-----	\$16.00
One lesson a week-----	9.00

Class Lessons

Harmony, per quarter-----	\$7.50
Counterpoint, per quarter-----	7.50
History of Music, per quarter-----	7.50
Theory of Music, per quarter-----	7.50
Ear Training, per quarter-----	7.50

EXPENSES

Piano rent, one hour a day, per quarter-----	\$ 2.50
Rent of Pipe Organ for practice, one hour a day per quarter -----	12.00

These rates are for lessons by the quarter only. Single lessons are more.

Pupils registering within the quarter are charged for one lesson more than is given them.

SCHOLARSHIPS

Friends of the institution have made three music scholarships available. One of these is given by Mrs. Avanell C.

Stambaugh. The name of the donor of the other two is withheld by request. The award is made by the President of the University and the Director of the School of Music. Preference is given to those who wish to take up the teaching of music.

GRADUATION FEES

Diplomas are awarded to students completing recital courses in Voice, Piano, Organ or Violin. The graduation fee is \$7.00.

Certificates are awarded to students completing the Teachers' Course in any of the above subjects, and to those completing the course in Public School Music. The graduation fee in these courses is \$2.00.

REGULATIONS

1. All tuition payable in advance.
2. Lessons lost with reasonable excuse will be made up where pupil has given teacher twenty-four hours notice of intended absence.
3. Credit will be given for work done elsewhere, the pupil being permitted to enter the grade for which he is prepared.
4. Practice rooms in the Music Building are provided for non-resident pupils.

REFUNDING

See earlier page of this catalogue.

SCHOOL OF AGRICULTURE

ANDREW SCOTT STAUFFER, DIRECTOR

Equipment

The Department of Agriculture, established in 1909, after having been closed for "the period of war," was reopened in September, 1919.

The University possesses a farm of ninety acres, conducted under modern principles of management, and has an equipment of modern agricultural machinery, including a Fordson tractor.

In view of the many soil formations of the region and the crops to which the University farm and the locality in general is devoted, soil and crop production can be very advantageously studied.

The horticultural department has a commodious experimental greenhouse just completed, which is stocked with the varied and rare plants for horticultural and biological instruction. Within a few blocks of the University are some of the largest greenhouses in the country, covered by 50 to 75 thousand square feet of glass. They are devoted to the raising of flowers, vegetables, the cultural operation of which the classes systematically observe and study.

The University library has upon its table the important current live stock literature, while the traveling library of the state supplies the institution with numerous volumes upon animal husbandry. Bulletins of experiment stations and of the United States Department of Agriculture, including the year book of that department and the works of the Bureau of Animal Industry, may be found on the library shelves.

Courses Offered

The University offers only those courses in which it has ample laboratory facilities for thorough teaching. For this reason the School of Agriculture offers accredited instruction only for the first two years of a four year course, paralleling in these two years the curriculum of leading state agricultural colleges. Students are advised to complete their last two years in a State University, which by reason of superior technical facilities for specialized courses, is enabled to serve the student more advantageously.

Schedule

See Liberal Arts Section.

SCHOOL OF RELIGION

MATRONA ANGELO BURRIS, DIRECTOR

SCHOOL OF RELIGION

The purpose of this school is to aid in the rescue of the truth, which results in the restoration, deepening and broadening of the spiritual in life; the interpretation of the proper place of the secular in its relation to life; and the final interpretation of all things in terms of the Christ-life in the individual and social life.

Philosophy was once religious. Then it became skeptical. Afterwards it again became religious. Once more it lapsed into scepticism. For some time, recently, the tendency has been for it to return to religion and Christianity, although it has scarcely known how to do so, or really known what constitutes Christianity.

It is thus seen that philosophy was anciently social, safe, and unified, but it later drifted to extreme individualism, or anarchy of thought. Then came Christianity tempering philosophy for centuries. Now the problem is to once more redeem it from anarchy; to try to convince the intellects of men that the only solution for the terrific and threatening modern conditions is a return to Christ. Great industrial leaders and statesmen have recently declared, in surprising numbers, that the only hope of saving our civilization is to be found in getting 'Back to Christ,' but they have not given us a system of thought or philosophy that will convince men's intellects of the necessity of Christ in modern life, nor a method of Christianizing the social, political and industrial orders.

Our purpose is to make this a most efficient and practical spiritual training school for the study of these problems.

COURSES OF STUDY

See Liberal Arts Section.

SCHOOL OF EXPRESSION

MAE DEMING MCCOPPIN, DIRECTOR

Introductory

Mrs. McCoppin is ably assisted by Major A. B. Cliffe Deming, M.A., B.O. Major Deming is a graduate of the Emerson College of Oratory, Boston, Mass., and Ohio Northern University. He has also had many years experience in teaching and platform art.

Special in Courses IV, V, VI and VII.

Aim

The aim of this school is to prepare men and women for fuller service in public speaking, whether as teachers, readers, lectures, preachers or lawyers, and also to meet the need of those who realize the general cultural value of the study of Expression. For this reason, expression is taught, not by imitation, but by the mastery of definite laws in such a way as to bring out the individuality of the student.

In selecting an institution for development in expression, the method of teaching employed deserves careful consideration. The best instruction is founded upon nature's method of causing expression—the mental process. Well established laws of psychology and pedagogy are employed, securing a steady "growth from within". What is learned here will not have to be unlearned later. For insincerity and affectation which receive justifiable criticism, there is substituted fuller appreciation of literature and aid in creating a desire to present these new found beauties in a true spirit of service.

The fact that the School of Expression is a part of the Ohio Northern University gives its students many advantages that come from university residence, participation in various college activities and opportunity of pursuing other studies with their expression course. Students in other courses can also take any part of the expression suited to their needs, after consultation with the Director of Expression.

Courses

The courses may be grouped under two general classes.

A. General Culture—for those desiring to meet the de-

mands of today's social intercourse. Sight Reading, Mythology, Voice Training, Breathing, Physical Culture, Literary Interpretation of Prose and Poetry, Extempore Speaking, Dramatic Training, Pantomime, Gesture and 55 Private Lessons.

B. Professional Culture—for Teachers, Platform Readers, Public Speakers, Clergymen, Lawyers, in fact, all who aim to profit by any form of Speech Arts. This course includes all subjects under the first course and Theory in Preaching and Teaching, School Management, Composition and Delivery of Orations, Forensic Oratory, Argumentation, Debate, Vocal Physiology, Correction of the Faults of Speech, Plot, Character Study and interpretation of Merchant of Venice, As You Like It, and Hamlet, with preparation and presentation of scenes for criticism, Platform Programs, Normal Work, in all departments and 90 Private Lessons.

1. **General Culture.** To meet the needs of those who wish to extend the sphere of their influence.

2. **Public Readers.** To develop students to meet the demand for the various kinds of entertainment; an enjoyable and profitable profession.

3. **Teachers of Expression.** Teachers with a mission are needed in every locality and they make the lives brighter of all who come under their influence.

4. **Public Speakers.** This course is to develop original thinking and persuasive presentation in the presence of an audience. It is especially helpful to Preachers, Lawyers, Teachers, and Lecturers but is so arranged as to meet the present day needs of all who desire or are required to speak before others.

5. **Teachers of Public Speaking.** This course includes parts of Courses I, II, III and all IV. It is to supply the demands of Y. M. and Y. W. C. A.'s, High Schools and Colleges.

The equivalent of "College Entrance Requirements" is necessary to enter this course.

6. **Dramatic Art.** Dramatic Construction, characterization and stage business are studied from the standpoint of interpretation. Plays are presented before the entire student body. Membership in the Dramatic Club is necessary for this course.

7. **Dramatic Coaching.** This course includes parts of Courses II, III, IV, V and all of VI. It is to meet the increasing demand for competent coaches for amateur plays by High Schools, Literary Clubs, etc.

8. **Fencing.** Courses may be had in either Foil or Sabre Fencing. This is the knightliest of sports, combining exercise with amusement. The body acquires ease, grace and suppleness, while the judgment, eye and nervous instinct are thoroughly cultivated. The instructor, Major Deming, in addition to his military experience, has had special instruction from the foremost exponents of French and Italian methods.

9. **Electives.** Those not desiring to register in any prescribed course may, with the advice of the Director of Expression, select parts of various courses, either in class or private lessons, to suit their needs.

NOTE: Students completing any of the teachers' courses are required to do practise teaching under supervision.

Children's Classes

On Saturday afternoon and at other times, in vocal training, reading and recitation.

Public Speaking

Practical courses are given to speakers to develop the power to think when on their feet, and secure not only a vocabulary, but control of voice modulations and pantomime actions. The student is assigned studies to awaken a true ideal of oratory. These develop mental power and grasp, logical method, and control of feeling as well as of voice and body.

Problems in Expression

Short passages, sentences, or phrases, original and selected, are rendered by students to stimulate the creative actions of mind, body and voice in natural unity.

Courses: 1. Problems in Reading. 2. Voice Problems. 3. Harmonic Problems. 4. Pantomimic Problems. 5. Dramatic Problems. 6. Problems in Speaking.

Recital and Contests

The school offers the students many opportunities of appearing before public audiences as readers, orators, debaters and public speakers in general. A goodly number of programs are arranged every year in the University and town, to all of which students are eligible. In addition, the students are expected to appear in frequent recitals given by the School of Expression.

Certificates and Diplomas

Those satisfactorily completing the One Year General Culture Course will be granted a certificate to that effect. Those satisfactorily completing the Two Year Professional Course will be granted a Diploma of Graduation by the University. The degree of Bachelor of Oratory is granted to those completing a three-year course, provided they hold a high school diploma or its equivalent.

EXPENSES

Tuition

Class Lessons, per quarter.....	\$15.00
Private Lessons, per quarter (15 lessons).....	15.00
Class and Private Lessons and Physical Culture.....	30.00
Private Lesson, single lesson.....	1.25
Textbooks, stationary, et cetera, per year, about.....	5.00
Physical Culture, per quarter.....	7.00

PHYSICAL EDUCATION AND INTER-COLLEGIATE ATHLETICS

J. OTTO NEWTON, DIRECTOR

**DEPARTMENT OF PHYSICAL EDUCATION
AND INTER-COLLEGIATE ATHLETICS**

Dr. J. Otto Newton, Director

Grace Norman Rosser and Ralph L. Stewart, Assistants

Classes in physical education and gymnasium practice will be organized separately for men and women.

This work seeks to develop muscular co-ordination, health habits, habits of exercise and capacities for leadership and ethical qualifications for departmental work administration.

The department also aims to provide a course in physical education and athletic coaching sufficiently comprehensive to meet the needs of those who wish to qualify themselves for positions as special instructors in the public and secondary schools and colleges. Y. M. C. A., Y. W. C. A. and the larger city play ground associations have already accredited the work of this department by accepting for responsible positions, students who have completed the courses offered.

It is required that the courses for advanced classes be open to such students only as have completed the elementary courses. The entire department is graded systematically and progressively.

Course No. 1

Elementary Physical Education

Two hours a week. One hour credit.

Correction of posture and physical defects, prescribed exercises for definite physical inefficiency and deficiency and fundamentals of theory and practice in calisthenics and recreational play ground activities.

Course No. 2

Advanced Course

Two hours each week. One hour credit.

Advanced theory and practice, gymnastic nomenclature, apparatus work and practical graded leadership. This work seeks to develop muscular co-ordination, health, habits of exercises,

capacities for leadership and moral qualifications for departmental administrations.

Course No. 3

Departmental Administration and Organization

Three hours each week. One hour credit.

This teachers' course will deal with personal hygiene, physical diagnosis, advanced gymnastics, theory and practice of teaching physical education.

In addition to the course suggested above this department will have general supervision of the organization of the inter-class, inter-mural, inter-society, and inter-fraternity athletics. A physical examination will be given each student at the beginning of each year and personal efficiency tests will be given one or more times each year. In order to secure a passing credit in this work, a definite advancement must be noted as the results of these tests. Courses one and two are required of all students in the Ohio Northern University before they may become eligible to any degree. Course three is elective and open to those who have completed courses One and Two.

Inter-Collegiate Athletics

Ohio Northern has been a member of the Ohio Conferences of Colleges in Athletics, commonly known as the "Big Six," since 1916, and an enviable reputation has been gained and maintained upon the "Simon Pure" basis of the quality of her teams and the character of her representatives in inter-collegiate athletics. In football, basketball and baseball, she has invariably been rated among the stronger colleges of the State, and just now the outlook for the future is most promising. A new athletic field of ample proportions provides equipment and space for a good diamond, football gridiron, tennis courts, and running track. The equipment of the varsity teams and the addition of assistants to the coaching staff insures a careful training and development of the "Varsity" in all sports. In fact, Ohio Northern offers the widest opportunity possible for outdoor sports, and takes just pride in maintaining varsity teams of the highest order.

Courses in Varsity Coaching and Physical Education

During the fourth quarter, commonly known as the summer quarter, the department of physical education offers six weeks course in coaching in various sports: Football, basketball and track. These courses will cover the fundamentals of each sport; team training, massage and care of injuries, the science of building plays, discussion of the systems now in use by the major coaches in the country, in addition to this fundamentals of physical education and practical work necessary to prepare men and women to handle this department in all high schools and graded schools. This entire course will be under the supervision of the director and his assistants. Fuller specifications as to the detailed work will be furnished upon application.

HONORARY DEGREES

Donaldson, Clara R.	(Ped. D.)	Kenmore, O.
Epley, J. F.	(M.A.)	Silver City, N. Mex.
Greenlee, Elmer E.	(D.D.)	Charleroi, Pa.
Lynch, Francis Napoleon	(D.D.)	Marietta, Ohio
Meck, David Channing	(LL. D.)	Cleveland, O.
McDowell, William Fraser	(LL. D.)	Washington, D. C.
Olive, James F.	(D.D.)	Defiance, O.
Ryder, H. E.	(M.S.)	Chardon, O.
Seymour, Arthur Halleck	(Ped. D.)	Aberdeen S. Dak.
Shade, Robert	(Ped. M.)	Kenmore, O.
Sullivan, Martin Elsworth	(M.S. in Ped.)	Columbus, O.
Simmons, George E.	(D. Sc.)	Orono, Maine
Turner, Mary Houser	(M.A.)	Ada, O.
Wilkins, Viola B.	(M.A.)	Delta, O.
White, James Alexander	(LL. D.)	Columbus, O.
Watkins, Edgar	(LL. D.)	Oglethorpe, Ga.

CLASS OF 1922

President, Glenn Cripps	Secretary, Geneva Basil
Vice President, P. M. Huntsman	Treasurer, Dwight Davis

COLLEGE OF LIBERAL ARTS

Case, Charles	(A.B.)	Alexandria, O.
Davis, Dwight	(B.S.)	Celina, O.
Hawver, Harley D.	(A.B.)	Antwerp, O.
Leist, James H.	(B.S.)	Circleville, O.
Moy, Hymn	(B.S.)	San Francisco, Calif.
Shank, Ruth	(A.B.)	Ada, O.
Walker, G. C.	(A.B.)	Wapakoneta, O.
Poling, Paul	(A.B.)	Ada, O.

COLLEGE OF EDUCATION

Bell, Hazel B.	(Grad. in Ped.)	Ada, O.
Basil, Geneva	(Grad. in Ped.)	Scott, O.
Basil, Velma	(Grad. in Ped.)	Scott, O.
Betzel, Rosa	(Grad. in Ped.)	Celina, O.
Bowen, Elsie	(Grad. in Ped.)	Sidney, O.
Bowyer, Fawn	(Grad. in Ped.)	Elida, O.
Brown, Gladys	(B.S. in Ed.)	Lima, O.
Conklin, Hazel	(Grad. in Ped.)	Radnor, O.
Collier, Faye C.	(B.S. in Ed.)	Ironton, O.
Dehus, Delores	(Grad. in Ped.)	Chillicothe, O.
Ewing, Anna	(Grad. in Ped.)	Ada, O.

Ehrman, Aldine	(Grad. in Ped.)	Elida, O.
Fast, Nellie	(B.S. in Ed.)	Haviland, O.
Gallapoo, C. R.	(B.S. in Ed.)	Ada, O.
Hanna, Essie	(Grad. in Ped.)	DeGraff, O.
Hoel, Gladys	(Grad. in Ped.)	Montezuma, O.
Morris, Evelyn	(Grad. in Ped.)	Lima, O.
McDonald, Kathleen	(Grad. in Ped.)	Coshocton, O.
McElroy, Helen	(Grad. in Ped.)	Ada, O.
Mullet, Datha	(Grad. in Ped.)	Continental, O.
McFadden, Fern	(Grad. in Ped.)	Shreve, O.
Miller, Owen C.	(B.S. in Ed.)	Iuka, Miss.
Rowland, Leefe	(Grad. in Ped.)	Upper Sandusky, O.
Snider, Rae	(Grad. in Ped.)	St. Johns, O.
Springer, Merle	(Grad. in Ped.)	Martins Ferry, O.
Still, Hilda	(Grad. in Ped.)	Warsaw, O.
Thurwachter, Rema	(Grad. in Ped.)	Leipsic, O.
Woodring, Dorothy	(Grad. in Ped.)	Port Clinton, O.
Hoel, Charles	(B.S. in Ed.)	Antwerp, O.
Hallier, Luella	(Grad. in Ped.)	Danbury, O.

COLLEGE OF ENGINEERING

Angulo, M.	(B.S. in M.E.)	Calamas, Columbia
Bierman, Linn C.	(C.E.)	Harrisburg, Pa.
Cottrell, Thos.	(B.S. in M.E.)	Bradley Beach, N. J.
Coene, H. G.	(B.S. in C.E.)	New Brighton, Pa.
Cuellar, A. E.	(B.S. in C.E.)	LaPaz, Bolivia
Cobb, Don, F.	(B.S. in C.E.)	Akron, O.
Carhart, C. M.	(B.S. in C.E.)	Pittsfield, Mass.
Cummings, Lloyd	(B.S. in Ch.E.)	Rose Hill, N. Y.
Castro, Santos	(B.S. in M.E.)	Mayaguez, P. R.
Cripps, Glenn	(B.S. in M.E.)	Grayling, Mich.
Daff, R. E.	(B.S. in C.E.)	Canton, O.
Decker, B. L.	(B.S. in E.E.)	Lilly, Pa.
Dispenza, S. J.	(B.S. in C.E.)	Buffalo, N. Y.
Detlor, C. C.	(B.S. in C.E.)	Woosfield, O.
Erdman, Edward A.	(E.E.)	Augusta, Wis.
Gehr, H. W.	(B.S. in C.E.)	Waynesboro, Pa.
Greer, Robert C. Jr.	(B.S. in C.E.)	Philadelphia, Pa.
Hilton, L. S.	(B.S. in M.E.)	Springfield, Mass.
Haney, H. L.	(B.S. in C.E.)	Ada, O.
Horowitz, Theodore	(B.S. in C.E.)	New York City
Henning, Lee. R.	(B.S. in C.E.)	Weston, O.
Kille, L. A.	(B.S. in E.E.)	Salem, O.
Liano, Manual	(B.S. in M.E.)	Arecibo, P. R.
Lieska, G. F.	(B.S. in M.E.)	Oak Harbor, O.

GRADUATES OF 1922

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Lorini, Hector	(B.S. in C.E.)	LaPaz, Bolivia
Lesnikowsky, F.	(B.S. in M.E.)	Smolany, Poland
Lamb, P. Y.	(B.S. in C.E.)	Hong Kong, China
Longwill, M. Floyd	(C.E.)	Montpelier, O.
Morgan, D. M.	(B.S. in C.E.)	Hazelton, Pa.
Miller, B. S.	(B.S. in C.E.)	Trenton, N. J.
Mumma, D. H.	(B.S. in Ch.E.)	Wilkinsburg, Pa.
Navidad, Jose	(B.S. in M.E.)	Agno Pangasinan, P. I.
Ogan, E. R.	(B.S. in C.E.)	Cumberland, O.
Page, Warder	(B.S. in C.E.)	Urbana, O.
Rodas, Jose	(B.S. in M.E.)	Los Piedis, P. R.
Reynolds, J. E.	(B.S. in M.E.)	Bridgeport, Conn.
Savage, P. A.	(B.S. in Ch.E.)	Blanchester, O.
Starnes, A. D.	(B.S. in Ch.E.)	Big Prairie, O.
Thompson, J. K.	(B.S. in M.E.)	New Brighton, Pa.
Waterloo, V. E.	(B.S. in C.E.)	Sturgeon, Pa.
Wells, J. E.	(B.S. in E.E.)	Ada, O.
Wong, W. T.	(C.E.)	Hong Kong, China
Zugsda, George	(B.S. in Ch.E.)	Cleveland, O.

COLLEGE OF LAW

Armstrong, H. P.	(LL.B.)	Hillsboro, O.
Anzelotti, F. P.	(LL.B.)	Youngstown, O.
Behrens, F. G.	(LL.B.)	Napoleon, O.
Braunstein, Max.	(LL.B.)	New Castle, Pa.
Bauknecht, J. E.	(LL.B.)	Bridgeport, O.
Crist, W. E.	(LL.B.)	Cincinnati, O.
Fairall, L. L.	(LL.B.)	Frazeyburg, O.
Granfield, John J.	(LL.B.)	Springfield, Mass.
Graham, E. D.	(LL.B.)	Frazeyburg, O.
Isham, D. D.	(LL.B.)	Ada, O.
McVicker, B. D.	(LL.B.)	West Salem, O.
Metcalf, Verner	(LL.B.)	Marietta, O.
Monti, V. I.	(LL.B.)	Tiltonville, O.
Montville, Hurst	(LL.B.)	Ada, O.
Osmun, John	(LL.B.)	Marion, O.
Reyes, Jose L.	(LL.B.)	Manila, P. I.
Shellenberger, H. D.	(LL.B.)	Bradford, O.
Sawyer, J. V.	(LL.B.)	Circleville, O.
Sugraves, Raphael	(LL.B.)	Manabo, P. R.
Thomas, D. H.	(LL.B.)	New Holland, O.
Tidd, C. D.	(LL.B.)	Stockdale, O.
Trunk, E. F.	(LL.B.)	Akron, O.
Vinocur, Lewis	(LL.B.)	Cleveland, O.
Harper, Fowler V.	(LL.B.)	Ada, O.

COLLEGE OF PHARMACY

Beck, F. J.	(Ph.G.)	Napoleon, O.
Bessler, J. P.	(Ph.G.)	Crestline, O.
Bloom, Lawrence	(Ph.G.)	Cleveland, O.
Burke, Mary M.	(Ph.G.)	Lowellville, O.
Dowds, J. F.	(Ph.G.)	Mansfield, O.
Dennis Ross L.	(Ph.G.)	Bloomdale, O.
Devol, O. E.	(Ph.G.)	New Straitsville, O.
Erdenberger, A. B.	(Ph.G.)	Mansfield, O.
Elliott, A. P.	(Ph.G.)	Gambier, O.
Gensert, H. G.	(Ph.G.)	Cleveland, O.
Hunstman, P. M.	(Ph.G.)	Gibsonburg, O.
Hurless, D. B.	(Ph.G.)	Willshire, O.
Houser, C. R.	(Ph.G.)	Ada, O.
Holt, Chester	(Ph.G.)	Piketon, O.
Hartford, P. C.	(Ph.G.)	E. Palestine, O.
Keyser, H. E.	(Ph.G.)	Wooster, O.
Karanilian, Peter	(Ph.G.)	West Hoboken, N. J.
Koons, O. A.	(Ph.G.)	Mansfield, O.
Leiken, Harry	(Ph.G.)	Cleveland, O.
Levenson, Wm.	(Ph.G.)	Cleveland, O.
Levitt, Jack	(Ph.G.)	Cleveland, O.
Makman, Jules J.	(Ph.G.)	Cleveland, O.
Startsman, Robert	(Ph.G.)	DeGraff, O.
Verbryke, W. V.	(Ph.G.)	Lima, O.
Wohl, M. A.	(Ph.G.)	Cleveland, O.
Winters, Erma	(Ph.G.)	Fort Wayne, Ind.

SCHOOL OF MUSIC

Brown, Carrie H.	(Grad. in P.S.M.)	LaRue, O.
Dearth, LaDonna	(Grad. in Piano)	Ada, O.
Weber, Walter R.	(Grad. in Piano)	Van Wert, O.

SCHOOL OF COMMERCE

Ryan, Mary Katherine	Marion, O.
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SCHOOL OF EXPRESSION

Basore, Glenna	(Grad. in Exp.)	Carlisle, O.
Ingledue, Grace	(B.O.)	Harrod, O.
Fairchild, Margaret	(B.L.I.)	Ada, O.
Fox, Vida L.	(Grad. in Exp.)	Port Monmouth, N. J.

REGISTER OF UNDERGRADUATES

(Summer Quarter, May 30, 1921—Spring Quarter, 1922, inclusive)

LIBERAL ARTS

Ahlefeld, Charles	Hardin	Klinger, Carmen	Paulding
Anspach, Eldred	Hardin	Klinger, Ruby	Paulding
Barnes, Vera I.	Hardin	Kepan, Joseph	Logan, Ill.
Brechelsen, Cahrlies	Hardin	Koehler, Dwight	Licking
Baker, Margaret	Hardin	Karns, Frank H.	Allen
Busick, Ralph	Paulding	Lee, Lester	Hardin
Carey, Carl C.	Hardin	Leist, James H.	Pickaway
Clark, Lyman	Hardin	Lorenz, T. E.	Litchfield, Conn.
Conner, J. Ries	Hardin	Lyman, F. A.	Hardin
Cox, Dorothy	Hardin	Maffett, Richard	Hardin
Cransaz, Robert	France	Mackintosh, Harold	Erie, Pa.
Cox, Viola	Hardin	Marz, Clarence	Stark
Coates, Robert M.	Belmont	Matheny, Walter	Hardin
Clayton, Genevieve	Hardin	Middleton, Lelan	Champaign
Davis, Dwight W.	Mercer	Miller, C. Stanley	Hardin
Davison, John H.	Allen	Miller, Glenn M.	Richland
Deming, John R.	Hardin	Minion, Lester R.	Cook, Ill.
Detrick, Stanley A.	Hardin	Moreland, L. S.	Washington, D. C.
Dobbins, Earl	Marion	Meister, Ethel	Belmont
Eibling, Elbert	Hardin	Mertz, Eva	Hardin
Elder, Thora	Hardin	Moorman, Hazel	Hardin
Eversole, Lucinda	Hardin	Otwell, Anna Mae	Kiowa, Okla.
Ferbrache, Ira R.	Holmes	Poling, Conwell	Hardin
Florida, Hesse	Hardin	Poling, Paul O.	Hardin
Fallquist, Albert	Allegheny, Pa.	Riley, Melvin	Knox
Freeman, Herbert	Hardin	Runkel, Luke	Hardin
Fusco, James	Trumbull	Porter, William	Allen
Faze, Yvonne	Allen	Pond, J. W.	Van Wert
Goodman, Ben	Hardin	Raudabaugh, Audrey	Auglaize
Gallant, Ruth	Hardin	Runser, Edna	Hardin
Greer, Herbert K.	Hardin	Sager, Prosper H.	Hardin
Greer, Dorothy H.	Hardin	Shoup, J. H.	Armstrong, Pa.
Guyton, Donna	Hardin	Smith, Donald O.	Miami
Hickman, John A.	Williams	Smith, Nolan	Hardin
Hover, Olive	Hardin	Stephens, Raymond	Auglaize
Howey, Lottie	Wyandot	Swisher, H. R.	Champaign
Horn, J. H.	Highland	Swisher, Ralph	Williams
Hullinger, Mildred	Hardin	Stuart, Ellis	Hardin
Howard, J. D.	Clark	Scott, Alice C.	Franklin, Mass.
Ingmlre, S. M.	Hardin	Snyder, Edith	Hardin
Irey, Genevieve	Hardin	Stemple, Margaret	Hardin
Jameson, F. S.	Hardin	Storer, Thelma	Hardin
Jones, David T.	Van Wert	Speese, George A.	Union

Swearingen, J. F.	Medina	Wilson, Carlin	Hardin
Taylor, Charles B.	Fayette, Pa.	Wiseman, O. M.	Lawrence
Tracey, Fred	Knox	Wilson, Foster	Shelby
Thomas, John S.	Belmont	Wilson, Ruth	Hardin
Vanhorn, Luke	Hardin	Whitworth, Eleanor	Hardin
Wagner, J. A. B.	Gallia	Williams, Aline	Allen
Wenger, Byron	Stark	Wiseley, Carre	Hardin
Whitman, S. Lee Jr.	Darke		

EDUCATION

Adams, William	Marion	Bowersmith, Florence	Union
Ammann, Peter	Coshocton	Brokate, Ople	Ottawa
Allender, A. M.	Hancock	Byerly, Treva	Madison
Armentrout, Elma	Logan	Barrick, Olive	Knox
Arn, Margie	Hardin	Bresler, Gladys	Marion
Arthur, Mabel	Madison	Billger, Adda	Auglaize
Adams, Golda	Allen	Brewer, Walter G.	Wyandot
Andrix, Nelle	Franklin	Bailey, Basil A.	Darke
Andrews, James	Mercer	Burgette, George W.	Hardin
Ayers, Hubert	Mercer	Bailey, Roscoe	Darke
Alspach, Marie	Hancock	Bame, Mabel	Seneca
Black, Roy N.	Clinton	Baransy, Eulah	Hardin
Bailey, E. Lehr	Shelby	Beall, Florence	Richland
Baughman, E. A.	Marrow	Borset, Edna	Hardin
Beam, Lillian	Darke	Botkin, Gladys	Clarke
Bowsher, Mabel	Allen	Bright, Mildred	Hancock
Baker, Verda	Hardin	Burgin, Joy L.	Logan
Brian, Velma	Paulding	Bush, Aurelia	Auglaize
Barrington, Mabel	Auglaize	Boone, Catherine	Hardin
Birt, Nellie M.	Darke	Bowen, Mabel	Wyandot
Born, Margaret	Allen	Brown, Mabel	Paulding
Blair, Gladys	Crawford	Burgett, Lenora	Hardin
Boley, Chas.	Mercer	Chalfin, Homer	Hardin
Bokate, Lucile	Ottawa	Coey, William	Ross
Brewer, Walter	Wyandot	Cotterman, D. W.	Allen
Blatt, Alice	Ottawa	Chambers, George	Scioto
Briggs, Carroll	Allen	Cook, Marion	Wyandot
Blatt, Carrie	Ottawa	Cady, Lucy	Washington
Bartlett, Bessie	Delaware	Clevenger, Thelma N.	Henry
Blank, Emma	Allen	Coate, Garnet	Hardin
Baker, Mamie	Hardin	Colter, Bernice	Van Wert
Busick Burnice	Paulding	Clark, Zona	Hardin
Bailey, Winona	Auglaize	Crum, Robert	Columbiana
Baker, Fairy	Hardin	Crawford, Alma	Auglaize
Bowers, Edith	Hardin	Crowe, Mary	Scioto
Burgett, Ruth	Clermont	Clapsaddle, Mabel	Hardin
Bowsher, Erma	Allen	Cox, Mary R.	Cuyahoga
Bailey, Ruth	Allen	Coats, Rebecca	Hardin

Chambers, Mildred	Cuyaboga	Fahl, Mona	Hancock
Clark, Esther	Hardin	Fulkerson, Lucy	Allen
Collins, Lavon	Hardin	Fisher, Fannie	Mercer
Crouse, Mrs. Gladys	Wyandot	Flinn, Louise	Hardin
Dunson, Georgia	Hardin	Fast, Annette	Paulding
Denius, Harry	Lorain	Foster, Lorena	Hancock
Dispennette, William E.	Licking	Flemming, Donald	Richland
Diehl, Clarence	Hocking	Foster, Walter	Van Wert
Day, Mrs. Mae	Marian	Farrow, Mary	Ashtabula
Durkin, Ivalue	Allen	Farrow, Nelle	Ashtabula
Davis, Blanche	Richland	Fisher, Vera	Van Wert
Diehl, Laura	Hocking	Fleck, Dorothy	Wyandot
Dixon, Opal	Logan	Funk, Enid	Paulding
Dobbins, Hazel	Hardin	Garwood, Merwin	Hancock
Davids, Bernice	Ottawa	Geiger, Ruth	Hardin
Davis, Mary	Scioto	Garwood, Guy	Hancock
Duvall, Lula	Auglaize	Germann, Stella	Van Wert
Davis, Helen	Adams	Grandstaff, H. E.	Morgan
Davis, Margaret	Scioto	Glenn, Helen	Pike
Dillon, Mina	Seneca	Goble, Clarence	Paulding
DeBolt, Hazel	Franklin	Glenn, Clare	Pike
Daniels, Helen	Hardin	Gamble, Frances	Van Wert
Davenport, Helen	Hardin	Garmon, Lavonne	Hardin
Doty, Alice	Hancock	Gigandet, Mary	Shelby
Dirmeyer, Ruth	Hardin	Gigandet, Esther	Shelby
Dillon, Emma	Seneca	Grady, Teresa	Allen
Ellison, Clarence	Hardin	Gary, H. J.	Ashtabula
Evans, Viola	Van Wert	Garmon, Lauren	Hardin
Ewing, Miriam	Hardin	Huffman, Wayne	Hancock
Eakin, Ellen	Pickaway	Haupt, Lawrence H.	Wyandot
Evans, Eva	Hardin	Hanselman, B. L.	Jackson
Elwood, Mary	Ashtabula	Horton, Gladys	Union
Elwood, Nancy	Ashtabula	Houser, Mary	Hardin
*Ewers, Carrie	Richland	Hughes, Mary	Putnam
Elder, Nova	Logan	Huggett, Irene	Hardin
Epley, Lucile	Hardin	Howard, Helen	Hancock
Ewing, Ethel	Hardin	Hatcher, Mattie	Logan
Elliott, Irene	Pike	Harter, Lottie	Champaign
Foltz, Don. A.	Hancock	Harris, Anna	Hardin
Foult, L. Edward	Paulding	Hockaden, Edith	Scioto
Fork, Berlin	Defiance	Hazelbacker, Myrtle	Scioto
Frysinger, Lowell	Mercer	Hershner, Faye	Crawford
Fawn, Ethel	Cuyaboga	Harvey, Khiva	Hardin
Force, Emma	Wayne	Hayden, Zee	Hardin
Fattler, Lenna	Madison	Hecker, Twila	Wyandot
Fackler, Fannie	Allen	Hunsicker, Opal	Hardin
Fisher, Adah	Mercer	Harris, Princess	Hardin
Fisher, Opal	Hardin	Huf, Clara	Franklin

Hinklin, Elizabeth	Marion	Lowe, Ruth	Hardin
Hause, Grace	Hancock	Lyons, Ralph	Mercer
Harvey, Mrs. Bertha	Hardin	Long, Velma	Hardin
Howard, Edythe	Clark	Leatherman, Ruth	Allen
Harsh, Olive	Stark	Livingston, Ralph	Hardin
Harper, May	Greene	Lea, Mrs. Little	Delaware
Harvey, Mary	Shelby	Long, Mildred	Crawford
Hammer, Frank	Hardin	Latham, Helen	Hancock
Hay, Herbert	Allen	Lininger, Mary	Mercer
Hoberg, Walter	Allegheny, Pa.	Lions, Julia	Allen
Herman, H. A.	Hancock	Leedon, Gordan	Pike
Henny, W. F.	Hancock	Ludwig, Day	Hardin
Halloran, Daisy	Erie	Latimore, Gladys	Hardin
Hart, Welcome	Montgomery	Lonas, Dora	Stark
*Hatcher, Agnes	Hardin	Lytle, Hazel	Van Wert
Henry, Cleah	Vinton	Lowry, Antoinette	Wyandot
Hover, Faye	Hardin	McCleary, C. W.	Allen
Harvey, Merrill	Hardin	Maffett, O. H.	Hardin
Ivers, R. D.	Scioto	Martin, Forest	Franklin
Ingersull, Etta	Union	Murry, Ray	Greene
Jones, Algia	Hardin	Moore, L. D.	Miami
Jones, Edna	Scioto	Moore, Mrs. Emma	Allen
Jones, Homer	Allen	Mead, Irene	Paulding
Jackson, Dorothy	Mercer	McElroy, Madeline	Hardin
Jackson, C. G.	Mercer	Mohr, Susie	Van Wert
Juillerat, Ida	Van Wert	McCrea, Mrs. Trella	Hardin
Keysor, Edgar	Paulding	Miller, Ruth	Hardin
Kalp, D. E.	Wesmoreland, Pa.	Meyers, Adeline	Henry
Kinnison, W. H.	Mercer	Marin, Jennie	Delaware
Kent, Earl	Auglaize	Matheny, Arlie	Hardin
Kelly, Mabel	Hardin	Murphy, Faye	Pike
Kieffer, John	Hancock	Martin, Mrs. Forest	Wood
Klingler, Wilma	Hardin	Musser, John	Auglaize
Klingler, Agnes	Hardin	McCoy, Doris	Allen
Kidwell, Mrs. M. D.	Hancock	McCoy, Dessa	Madison
Kidd, Mamie	Allen	Martin, Imogene	Hardin
Kelley, Mabel	Hardin	Morrison, Helen	Hardin
Kramer, Iness	Allen	Moore, Gertrude	Allen
Knisley, Myra	Pike	McCleary, Fairy	Allen
Kenar, Charlotte	Hardin	Markley, Jane	Lima
Kauble, Mary	Hardin	Murry, Faye	Greene
Killoran, Esther	Allen	McElwaine, Fay	Allen
Kilbridge, Katherine	Erie	Moore, Mrs. Lee	Miami
Kent, Lela	Auglaize	McCarty, Daniel	Allen
Kohn, Harry B.	Paulding	McClain, Floyd	Wyandot
Kidd, Lola	Allen	McElroy, Justin	Hardin
Klinger, Ola	Allen	Mikesell, Homer	Preble
Klingler, Dorothy	Hardin	Money, Cloyd	Randolph, Ind.

Main, Russell	Hardin	Royer, Wilber E.	Logan
McCoy, Bernice	Van Wert	Richey, D. Paul	Delaware
McKinley, Georgia	Jefferson	Ryder, Harold	Geauga
McRill, Edna	Hancock	Roush, Jeanette	Fayette
McWilliams, Agnes	Hardin	Roush, Josephine	Fayette
Marshall, Devona	Hardin	Ream, Anna E.	Hardin
Morris, Ruth	Hardin	Rounds, Mrs. Mae	Hardin
Mortz, H. E.	Scioto	Ramer, Marie	Hardin
Myers, Frances	Marion	Rockey, Lela	Hardin
Marty, Delphine	Hardin	Robinson, Dorothy	Allen
McCready, Helen	Richland	Rockwell, Zelma	Hardin
Northup, R. V.	Hardin	Rogers, Bessie	Mercer
Naragon, F. R.	Erie	Runkle, Ethyl	Ross
Nickell, Norma	Auglaize	Rose, Hope	Hardin
Nickell, Dorothy	Auglaize	Roberts, Anne	Madison
Nau, Golda	Hardin	Reilly, Drusilla	Allen
Nye, Stella	Wyandot	Ropp, R. L.	Paulding
Newman, Lillian	Scioto	Reynolds, Charles H.	Washington, Pa.
Neeley, Paul	Hardin	Ritchie, Dorothy	Allen
Nielson, Marian	Cuyahoga	Rubin, Esther	Auglaize
Newell, Anna	Wyandot	Runser, Helen	Hardin
Ober, J. V.	Wood	Runyan, Thelma	Shelby
Osgood, Ola	Allen	Ries, Marcella	Hardin
Oberly, Frieda	Hardin	Ramey, E. Vergie	Delaware
Owens, Clarabelle	Allen	Schilling, Henry	Wyandot
Orians, Mary	Wyandot	Smith, L. R.	Scioto
Ocborn, Eva	Van Wert	Smith, M. O.	Washington
Parker, Naomi	Allen	Smith, W. L.	Logan
Pugh, Mrs. M. G.	Miami	Sheridan, Carol	Marion
Parks, F. E.	Crawford	Schaefer, Louise	Hardin
Patton, Gail	Hardin	Swartz, Edith	Wyandot
Parlette, Opal	Allen	Simon, Helen	Putnam
Pond, Velma	Paulding	Shadley, Frances	Hardin
Plummer, Mildred	Hardin	Shadley, Ruby	Hardin
Piper, Fern	Wayne	Stine, Maude	Wayne
Parsell, Ethel	Hardin	Shaw, Clara	Logan
Price, Georgia	Wood	Sinkley, Lela Artlee	Delaware
Price, Marguerite	Hardin	Shoup, Eugenie	Tippecanoe, Ind.
Platt, Belle	Mercer	Sprain, Goldie	Hardin
Porter, Hazel	Marion	Slemmer, Dorothy	Wyandot
Price, Mary	Delaware	Stauffer, Helen	Hardin
Pollock, Frank	Monroe	Sleesman, Mary	Hardin
Parks, F. J.	Richland	Shuster, Lucile	Hardin
Perfect, Mildred	Delaware	Stalter, Helen C.	Wyandot
Plummer, Phyllis	Logan	Stull, Vera	Richland
Pollock, Lela	Allen	Simpson, Helen	Tuscarawas
Pontius, Lula	Wood	Stamm, Opal	Knox
Quay, Catherine	Crawford		

Smith, Edna	Hardin	West, Eugenia	Tuscarawas
Stang, Anna	Shelby	Williams, Helen	Hardin
Schrader, Irene	Knox	Wilcox, Mrs. Martha	Marion
Stephens, Winnie	Shelby	Wikle, Delilah	Montgomery
Seitz, Sherwood	Clinton	Whitmer, Nola	Allen
Sink, Francis	Hardin	Wilson, Mary V.	Hardin
Sleesman, George	Hardin	Wright, Florence	Tuscarawas
Sprague, Milton	Huron	Wolfe, Alice	Hardin
Steinman, B. W.	Hancock	Williams, Elsie	Hardin
Smythe, Glenn M.	Wyandot	Woods, Sigrid	Hardin
Saunders, A. C.	Hancock	White, Elizabeth	Jefferson
Sink, Lois	Hardin	Williams, Flossie	Hardin
Slagle, Chelsea	Fairfield	Walsh, Helen	Scioto
Snyder, Anna	Paulding	White, Edna	Scioto
Steiner, Marian	Hardin	White, Clara	Scioto
Steinmetz, Blanche	Wyandot	White, Edith	Scioto
Staufer, Gertrude	Hardin	Wolff, Lillie	Richland
Schlup, Myrtle	Hardin	Wright, Lucille	Allen
Stone, Mary Ethel	Crawford	Weldy, Burnice	Van Wert
Tipple, Ray	Delaware	Weldy, Eunice	Van Wert
Terrell, C. W.	Perry	Welsh, Evalyn	Hardin
Trunko, Ethel	Marion	Wright, Edna	Allen
Temple, Alice	Hardin	Watts, Louise	Ashland
Taylor, Ida	Paulding	Windle, Lillian	Scioto
Temple, H. S.	Richland	Winegardner, Stanley	Allen
Thobaben, Ruth	Champaign	Webb, Helen	Van Wert
Thomas, Neva	Allen	Williams, Olwen	Paulding
Tickle, Reah	Mercer	Wiswell, Marie	Auglaize
Ulrich, Geo.	Wyandot	Wolfe, Grace	Hardin
Underhill, P. H.	Allen, Ind.	Washburn, Hazel	Pike
Underhill, Mrs. Kathleen	Allen, Ind.	Young, Vermont	Mercer
VanAtta, Ernest	Hardin	Yentzer, Edna	Wyandot
Vassar, Lela	Hardin	Young, Dee	Mercer
VanDorn, Opal	Wood	Yoder, Nelle	Wood
VanDorn, Ruth	Wood	Yoakum, Opal	Allen
Winegardner, Arthur	Allen	Yentzer, Ethel	Wyandot
Windle, Joseph	Putnam	Young, Elizabeth	Franklin
Wade, V. D.	Richland	*Deceased	

ENGINEERING

Abbott, L. Emerson	Hamilton	Alzona, P. M.	Philippines
Abeel, Theo. E.	New Jersey	Armstrong, W. P.	Mercer, N. J.
Adler, Frank J.	Franklin, Mass.	Allen, Herbert	Erie, Pa.
Aldrey, J. L.	Kings, N. Y.	Belen, Adele	Philippines
Allcroft, Jas. W.	Essex, N. J.	Baines, Percy	Fairfield, Conn.
Allinger, N. J.	Allen	Barney, Ernest	Colombia, S. A.
Alspaugh, J. W.	Allen	Barnum, Lester	Berkshire, Mass.

Bell, W. E.	Perry	Carver, E. L.	Lucas
Bauer, Carl	Montgomery	Darrah, Hale D.	Portage
Beck, A. D.	Cayuga, N. Y.	Diemer, J. C.	Cuyahoga
Beeney, Herbert	Knox	Davis, J. A.	Miami
Bero, Geo.	Seneca	Decker, F. J.	Monroe, N. Y.
Berry, Martin	Union	Delahoy, D. L.	New York
Berry, Russell	Washington, Pa.	DeHaven, P. C.	Lancaster, Pa.
Bielenberg, Max	Wayne, Mich.	Delzell, F. M.	Columbiana, Pa.
Bird, E. L.	Hardin	Demeroto, A. F.	Nassau, N. Y.
Blaklock, Thos.	Essex, N. J.	Drury, H. S., Jr.	Armstrong, Pa.
Bolquerin, Ralph	Philippines	Durnell, B. P.	Fayette
Bolster, Geo. L.	Mass.	Day, Marion W.	Orange, N. Y.
Booker, Ralph	Franklin, Mass.	Deltrick, R. W.	Cuyahoga
Boulton, Frank	Erie, N. Y.	Dixon, Fred	Luzerne, Pa.
Braglio, Chas.	Armstrong, Pa.	Eames, D. C.	Denver, Col.
Bricker, Richard	Wayne	Edwards, C. L.	Lackawanna, Pa.
Brockerman, Herman	Logan	Ellaby, C. H.	Jefferson, Ky.
Brown, H. A.	Cattaraugus, N. Y.	Elliott, Clayton E.	Jefferson, Ala.
Brown, J. B.	Steuben, N. Y.	Ellis, S. W.	Mahoning
Brown, L. C.	Sandusky	Eshbaugh, W. P.	McKean, Pa.
Brownell, F. B.	Suffolk, N. Y.	Edwards, Wayne E.	
Buckwalter, R. E.	Mahoning		Lackawanna, Pa.
Buell, H. H.	Washington	Foeller, S. M.	Wayne, Mich.
Burnham, A. L.	Ashtabula	Forney, Dale	Hardin
Barnes, Jean C.	Hardin	Fox, Ethan	Ottawa
Breckinridge, R. E.	Allen	Francis, F. O.	Erie, N. Y.
Cotner, Walter	Allen	Frederick, A. E.	
Caffee, H. G.	Hardin		Westmoreland, Pa.
Calahan, Foster	Hardin	Furst, H. T.	Stark
Carr, Geo. W.	Sussex, N. J.	Frick, Darrell C.	Beaver, Pa.
Cato, W. C.	Chautauqua, N. Y.	Galbreath, F. H.	Clemont
Chambers, D. F.	Hancock	Gallapoo, Oren	Paulding
Chaney, H. D.	Columbiana	Garwood, I. Nels.	Cuyahoga
Clapper, R. M.	Muskingum	Gerhart, C. C.	Crawford
Cone, Jas. H.	Middlesex, Conn.	Gilbride, R. O.	Lackawanna, Pa.
Clevenger, A. L.	Allen	Gottlieb, Manious	York, Pa.
Clymer, Gale	Hancock	Guglin, N. J.	Summit
Coffman, O. G.	Logan	Grunau, Geo.	Cuyahoga
Conant, I. J.	Berkshire, Mass.	Graybill, E. D.	Stark
Conley, John	Erie, N. Y.	Gledhill, Wayne	Crawford
Cookingham, M. D.	Allen	Gomulka, John, Montgomery, N. Y.	
Coopersmith, W. D.	Allen	Gorsuch, R. G.	Monroe, N. Y.
Crooks, Harlow	Portage	Haley, Franklyn	Seneca
Cullings, Geo.		Harmon, W. W.	Kings, N. Y.
	Schenectady, N. Y.	Harmon, J. H.	Hardin
Cook, Fred W.	Aiken, S. C.	Harp, C. M.	Forest, Pa.
Capell, Paul R.	Hardin	Harris, Wm. P.	Erie
Carpenter, Dale	Fulton	Hauser, Chas. A.	Essex, N. J.

Heal, Harold	Lorain	Love, William	Guernsey
Hedges, J. S.	St. Joseph, Mich.	McConnell, G. E.	Tuscarawas
Hillery, Archie	Hamilton	Macys, Vincent	Cuyahoga
Horst, C. M.	Wayne, Mich.	Maridon, James	Armstrong, Pa.
Hassler, Willard	Logan	Martin, D. E.	
Hover, E. W.	Mahoning		Northumberland, Pa.
Huden, I. Chas.	Suffolk, N. Y.	Martiny, H. J.	Cattaraugus, N. Y.
Houff, J. A.	Lorain	Matthisa, C. N.	Clinton, Pa.
Highland, R. H.	Harrison, W. Va.	Meredith, H. J.	Warren
Harkness, F. B.	Charlotte, Vt.	Miller, H. C.	Logan
Hipsher, N. F.	Marion	Miller, W. J.	Nelson, Ky.
Holman, Carl	Hardin	Miser, D. J.	Jefferson
Hazelton, S. D.	Ingham, Mich.	Moore, Norman	Indiana, Pa.
Jackson, H. A.	Kent, Mich.	Moore, Stanley	Luzerne, Pa.
Jefferies, W. R.	Monroe	Morgan, John R.	Wayne, Mich.
Johns, E. V.	Summit	Morrison, Harrold	Delaware, Ind.
Johnson, J. R.	Osceola, Mich.	Morton, E. L.	Crawford
Johnson, Phillip	Middlesex, Conn.	Mouery, H. D.	Trumbull
Jones, Albert R.	Muskingum	Myrberg, O. E.	Mecosta, Mich.
Jones, Arley	Mercer	Morgan, C. R.	Lucas
Keenan, G. W.	Monroe, N. Y.	Miller, E. C.	Seneca
Kelley, W. H.	Custar, Mont.	Malcove, N. L.	Canada
Kierman, J. H.	Greene	Mendoza, H.	Philippines
Kenney, Paul W.	Licking	Neff, Robert	Auglaize
Knapp, I. W.	Ashtabula	Nelson, David A.	
Knupp, R. W.	Stark		Middlesex, Mass.
Kohlmeier, B. P.		Olmstead, W. L.	Wayne, Mich.
	Cattaraugus, N. Y.	Nesbet, O. K.	Barry, Mich.
Konopky, Irving	Fairfield, Conn.	Olivera, J. B.	Brazil, S. A.
Kraner, L. F.	Allen	Nincehelser, H. S.	Champaign
Kukde, Shahu P.	India	Ours, Reed	Marion
Kellmer, H. B.	Cuyahoga	Palmer, H. K.	Chemung, N. Y.
Lanning, A. J.	Mercer, N. J.	Parker, C. W.	Allegheny, Pa.
Labetan, Samuel	York, Pa.	Pelaez, Abel	Colombia, S. A.
Leach, C. H.	Erie, N. Y.	Pettit, Max	Medina
Leathers, L. D.	Auglaize	Pfifferling, J. F.	York, Pa.
LeVine, A.	Orange, N. Y.	Phillips, H. D.	Alexandria, Va.
Lewandowski, J. J.		Pixler, John	Holmes
	New Haven, Conn.	Polling, F. A.	Hardin
Lewis, A. W.	Ingham, Mich.	Ponsetto, J. L.	
Lewis, Thomas J.	Harrison		Westmoreland, Pa.
Lobo, Orion	Brazil, S. A.	Poole, Russel	Williams
Lord, Monroe	Monroe, N. Y.	Powell, F. G.	Ashtabula
Lorini, Hector	Bolivia, S. A.	Prichard, L. W.	Portage
Lowry, Franklin	Wyandot	Prudent, Henry	Clermont
Lundberg, A. T.	Berkshire, Mass.	Pugh, M. G.	Miami
Lundberg, Morris	Berkshire, Mass.	Pugh, P. R.	Logan
Leonard, E. N.	Cabell, W. Va.	Plympton, R. E.	Franklin, Mass.

Pennington, Josiah Shawano, Wis.
 Ritchie, W. C. Armstrong, Pa.
 Robertson, B. L. Wayne, Mich.
 Robinson, J. T. Jefferson, Pa.
 Robas, Jose Porto Rico
 Rodenberger, F. A. Hardin
 Rodgers, Fred Cambria, Pa.
 Roeder, Dale Allen
 Roth, W. Portage
 Rothrock, G. B. Hardin
 Ruckman, James Marion
 Runel, D. E. Darke
 Russel, L. G. Paulding
 Ryman, Wilson Luzerne, Pa.
 Rogers, D. K. Blair, Pa.
 Ring, J. M. Allen
 Reading, W. J. Erie, N. Y.
 Raisnyder, Frank Crawford
 Rockhill, Russel Putnam, Ill.
 Schamehorn, P. Allen, Ind.
 Schaunn, W. H. Wayne
 Schmuck, Roland Venango, Pa.
 Schutze, C. H. Fairfield, Conn.
 Senior, A. H. Venezuela, S. A.
 Shaffer, R. C. Cambria, Pa.
 Shanley, L. O. Miami
 Shultz, R. E. Fulton
 Sickles, L. G. Brown, Wis.
 Siefert, M. J. Clark
 Silverman, Max Kings
 Slater, Galen Wayne
 Smith, Donald Stark
 Smith, Paul Armstrong, Pa.
 Snedden, T. R. Lawrence, Pa.
 Snyder, T. M. Shelby
 Sprankel, G. K. Erie
 Stalder, Harold Hardin
 Stark, Edgar Erie, N. Y.
 Starner, Edwin Holmes

Steele, George H. Trumbull
 Stormer, Paul Venenango, Pa.
 Sullivan, D. F. Hampden, Mass.
 Swindler, B. W. Paulding
 Saramento, J. N. Brazil, S. A.
 Stinebaugh, M. E. Auglaize
 Slygh, L. L. Allen
 Schernerhorn, J. R. Winona, Minn.
 Shappell, C. N. Allen
 Schaefer, R. E. Belmont
 Schaeffer, G. D. Allen
 Sondag, E. Crawford
 Talbot, P. Washington
 Thobaden, W. H. Cuyahoga
 Thompson, W. L. Erie, Pa.
 Thornburgh, Fred Henry, Ind.
 Turner, R. H. Ingham, Mich.
 Thompson, Paul Hardin
 Upp, Arthur Williams
 Vaughn, M. E. Worcester, Mass.
 Vincent, H. L. Pierce, Wash.
 Wander, R. W. Knox
 Watson, A. Washington, Pa.
 Welch, James Livingston, N. Y.
 Wenzel, E. G. Peru, S. A.
 Whipkey, C. E. Somerset, Pa.
 Wilcox, Grant McLean, Ill.
 Williams, T. J. Jr. Lake, Ill.
 Witchey, Ralph Clearfield, Pa.
 Wolf, David Ottawa
 Witzler, H. F. Wood
 Wright, H. D. Allen
 Woolever, A. E. Lake
 Yochum, Carl Brown
 Yznaga, J. A. Cuba
 Zimmerman, Walter Jefferson, Pa.

LAW

Bendure, D. R. Guernsey
 Blank, Carl Allen
 Bow, Frank Stark
 Brown, Kenneth Franklin
 Burkett, J. F. Hancock
 Collier, James Lawrence

Cox, Albert N. Hardin
 Cross, Ward C. Ashtabula
 Comforti, N. J. Fayette, Pa.
 Cunningham, Isabel Hardin
 Dolf, Q. E. Jefferson
 Dalton, N. M. Montgomery

Dumbauld, Hazel	Hardin	Melvin, W. E.	Lawrence
Evans, Merl	Beaver, Pa.	Nichols, Robert	Richland
Fitts, Robert	Marion	Nichols, Russel	Richland
Fillman, Walter	Lucas	Patterson, Charles A.	Hardin
Frick, H. W.	Seneca	Patton, C. M.	Marion
Frey, Dorothy	Clermont	Randall, C. A.	Erie, Pa.
Granfield, J. J.	Hampden, Mass.	Robinson, D. C.	Cuyahoga
Greybill, Clifton	Stark	Ridenour, J. E.	Allen
Gullinger, B. E.	Mahoning	Scheverrol, J. L.	Portage
Gooch, C. D.	Henry, Mo.	Schlegel, P. L.	Summit
Johnson, W. L.	Van Wert	Schields, Fred L.	Clermont
Johnson, Eunah	Van Wert	Shinn, William	Williams
Jones, L. E.	Putnam	Siever, John	Allen
Kalbfleisch, G. E.	Richland	Silk, John A.	Stark
Kane, David	Fairfield, Conn.	Soglovitz, Paul	Cuyahoga
Kelley, W. J. B.	Venango, Pa.	Spellman, V. W.	Hardin
King, Wayne B.	Stark	Stansbury, Rodney	Allen
Kemble, M. H.	Darke	Stein, Harry	Mahoning
Lewis, Robert S.	Jefferson	Stewart, R. L.	Washington
Leech, P. N.	Coshocton	Stroup, A. M.	Hardin
Luna, E.	Philippines	Sugranes, R. G.	Porto Rico
Lindhorst, Lester	Cuyahoga	Smith, R. L.	Mahoning
McCorkhill, C. G.	Carroll	Thompson, P. E.	Hardin
McInturff, Paul	Champaign	Tudor, A. D.	Allen
Mikesell, Homer	Preble	Turner, W. L.	Belmont
Moke, J. J.	Allen	Turner, W. F.	Stark
Monahan, George	Hardin	Weimer, Ralph	Medina
Montville, Hurst	Hardin	Wiedemann, Frank	Marion
Mosebacher, Matt J.	Crawford	Williams, E. L.	Mahoning
Myers, W. G.	Putnam	Wisman, A. W.	Crawford
McGinnis, Herbert	Allen	Wright, E. M.	Bonneville, Idaho
Miller, H. F.	Lucas	Weber, Mrs. Ada	Hardin

PHARMACY

Attenson, P. I.	Cuyahoga	Evans, W. C.	Greenup, Ky.
Adelstein, Nathan	Cuyahoga	Fish, K. A.	Wood
Albanese, A. J.	Cuyahoga	Friedman, R. I.	Cuyahoga
Albin, C. D.	Paulding	Fryer, P. N.	Kings, N. Y.
Berman, J. G.	Cuyahoga	Gamble, Vera	Beaver, Pa.
Best, W. R.	Washington	Greenwald, John	Summit
Brickman, H. B.	Defiance	Hertzner, F. W.	Seneca
Brody, Morris	Cuyahoga	Holland, A. N.	Columbiana
Brown, F. B.	Warren, Pa.	Hutson, R. R.	Allen, Ind.
Brown, Jacob	Cuyahoga	Harr, E. A. Jr.	Champaign
Brydon, J. R.	Cuyahoga	Hutton, Jack	Belle, Ky.
Cunningham, J. T.	Hardin	Jordan, Robert	Cuyahoga
Daum, F. P.	Crawford	Kerchmer, Clifford	Seneca
Dishong, I. I.	Wood	Kortier, H. K.	Wood

UNDERGRADUATES

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Kring, V. F.	Allen, Ind.	Shirley, F. M.	Paulding
Kantor, E.	Cuyahoga	Shoemaker, R. J.	Hancock
Lasher, L. L.	Cuyahoga	Stabler, Charles	Paulding
Livsey, Algon	Stark	Tanrus, K.	Cook, Ill.
Lipicky, Nichols	Cuyahoga	Tannehill, A. J.	Marrow
Miller, Burdette	Marion	Thompson, F. L.	Putnam
Molitoris, Nicholas	Cuyahoga	Thornton, D. G.	Summit
Mathews, E. C.	Cuyahoga	Timblin, W. C.	Harrison
Martin, C. E.	Coshocton	Turner, C. E.	Columbiana
Naneche, Rene	Armstrong, Pa.	Van Stronder, D. L.	Hardin
Perlich, P. H.	Cuyahoga	Wagner, D. M.	Summit
Poulston, H. D.	Summit	Welday, H. S.	Jefferson
Reed, Robert E.	Wayne	Wolfe, H. A.	Seneca
Renlinger, Walter	Putnam	Wolfley, P. F.	Hardin
Richardson, Howard	Allen	Wolstein, S. M.	Cuyahoga
Robinson, Nathan	Cuyahoga	Worm, Theodore	Cuyahoga
Robinson, Samuel	Cuyahoga	Wood, F. W.	Ashtabula
Rocen, S.	Cuyahoga	Winters, Erma	Allen, Ind.
Sams, N. W.	Hardin		

PRE-MEDIC

Burger, W. F.	Erie	Moyer, Myron	Auglaize
Conner, E. M.	Hardin	Poling, Eric	Montgomery
Dughman, John	Logan	Roof, Clyde	Clark
Durliat, P. J.	Wood	Selen, S.	Allegheny, Pa.
Ewing, E. P.	Hancock	Shank, Paul	Hardin
Geis, R. M.		Shontz, R. A.	Northumberland, Pa.
Goldstein, David	Cuyahoga	Stocker, Edna	Auglaize
Hardgrove, G. L.	Wayne	Sidener, Helen	Allen
Jackson, Mildred	Allen	Warninsky, Frank	Summit
Kidd, Harry L.	Franklin	Warren, R. A.	Ontario, N. Y.
Kaplan, H.	Allen	Wyre, W. W.	Allen

COMMERCE

Ayres, C. L.	Belmont	Erwin, J. R.	Allegheny
Andrews, L. J.	Mercer	Erwin, W. W.	
Aleroft, Mrs. J. W.	Hardin	Eckenrode, Lena	Hardin
Banning, Edwin	Hardin	Fisher, Robert	Stark
Burns, L. T.	Montgomery	Francis, Geraldine	Crawford
Boyer, Huber	Shelby	Gwinner, Russel	Crawford
Bodell, Alma	Hardin	Grubbs, Louis	Hardin
Bowers, Paul	Hardin	Herman, H. J.	Williams
Burnette, Maxine	Hardin	Hannett, R. E.	Erie, N. Y.
Brown, Mrs. Richard		Hower, Fred	Richland
	Berkshire, Mass.	Herd, Adner	Delaware
Cole, C. W.	Erie	Harrod, Ola	Allen
Corfman, Ray	Hardin	Harbourt, Ella	Jefferson
DeWeese, H. D.	Miami	Harrod, Victoria	Allen

Jones, Ben	Hardin	Roxin, Augusta	Hardin
Johnson, Ruth	Muscatine, Iowa	Smith, L. R.	Crawford
Jedkins, Lela	Hardin	Stecker, W. A.	Richland
Kelley, W. B.	Allegheny, Pa.	Stetler, Paul	Allen
Krepts, C. E.	Fayette, Pa.	Stevens, Charles	Summit
Klingeld Constance	Hardin	Shaffer, Alma	Cambria, Pa.
Lavelly, Helen	Wyandot	Shelley, Helen	Hardin
Ludwig, Day	Hardin	Stryker, Margaret	Somerset, N. J.
Moore, Isaac	Wood	Sterritt, Beldren	Morrow
McElroy, Harry	Hardin	Tuason, B. C.	Philippines
Rodabaugh, M. T.	Hardin	Thomas, R. W.	Clinton, Utah
Ross, C. W.	Forest, Pa.	Vershey, Opal	Hardin
Rogers, J. C.	Wood	White, B. H.	Allen
Reedy, Hildred	Hardin	Welty, Agnes	Hardin
Russell, Georgia	Hardin	Wilcox, Mildred	Franklin, N. Y.

PRE-COMMERCE

Denton, W. H.	New York	Seely, W. N.	Northumberland, Pa.
Ellis, Thomas	Mahoning	Steiner, W. W.	Stark
Kenwood, James	Wayne, Mich.		

MUSIC

Allen, Alice	Hardin	Cady, Anna	Washington
Bell, William	Perry	Cole, Mildred	Hardin
Berger, Lewis	Hardin	Cooney, Helen	Hardin
Brame, Clona	Hardin	Devol, O. E.	Perry
Buehler, Edna	Hardin	Diener, I. C.	Cuyahoga
Bureau, Edna	Hardin	Davis, Theodore	Hardin
Baransy, Florine	Hardin	Davis, June	Hardin
Brewer, Helen	Custar, S. Dakota	Davison, Ada	Hardin
Bowers, Opal		Dally, Audrey	Hardin
Blatt, Alice	Ottawa	Detrick, Marjorie	Hardin
Blatt, Carrie	Ottawa	Bailey, Ruth	Hardin
Barnes, Vera I.	Hardin	Elder, Thora	Hardin
Bailey, Winona	Auglaize	Erwik, W. M.	Hardin
Barrick, Olive	Knox	Elbin, Mrs. G. H.	Hardin
Cobb, D. F.	Summit	Earl, Virginai	Hardin
Cone, J. H.	Middlesex, Conn.	Ernsberger, Mrs. Helen	Hardin
Clark, Laven	Hardin	Eibling, Cora	Hardin
Clark, Leola	Hardin	Friedley, Dorothy	Hardin
Cotterell, Erma	York, Pa.	Fry, Margaret	Hardin
Cox, Dorothy	Hardin	Fast, Annette	Paulding
Cox, Viola	Hardin	Garner, Edison	Jefferson
Cretois, Martha	Hardin	Gary, H. J.	Ashtabula
Campbell, Mildred	Hardin	Gomulka, John	
Campbell, Mary	Hardin		Montgomery, N. Y.
Church, Ruth	Hardin	Granfield, J. J.	Hampden, Mass.
Conner, Edith	Hardin	Graybill, Clifton	Stark
Cook, Mildred	Hardin	Greenwald, J. A. Jr.	Summit
Cotner, Mary	Hardin	Grenau, Raymond	Hardin

Garmon, Lavenne	Hardin	Mohler, Rosemary	Hardin
Gigandet, Mary	Shelby	McGinnis, Evelyn	Hardin
Garwood, Murwin	Hancock	Mazzula, Maude Ogden	Hardin
Gallant, Ruth	Hardin	Nickles, Juanita	Tuscarawas
Gamble, Frances	Van Wert	Plikerd, Letha	Allan
George, Ruby	Hardin	Poe, Leah	Hardin
Gesaman, Alice	Hardin	Pontius, Lulu	Wood
Gilford, Alice	Hardin	Phillips, Louella	Hardin
Huston, C. V.	Hardin	Poling, Ella	Union
Hoel, Gladys	Mercer	Reyes, J. L.	Philippines
Hover, Lois	Hardin	Renynolds, Chas. H.	
Huffman, Janet	Hardin		Washington, Pa.
Hilty, Margaret	Hardin	Rodabaugh, Myron	Hardin
Hulme, Gladys	Miami	Ruckman, James	Marion
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Johnston, Rowena	Hardin	Raabe, Mary Smith	Hardin
Judkins, Lois Jean	Hardin	Roth, A. L.	Hardin
Kille, L. A.	Columbiana	Rose, Hope	Hardin
Klingler, Constance	Hardin	Silk, John A.	Stark
Kohn, Pauline	Paulding	Smith, Ben V.	Hardin
Kinnear, Ethel	Hardin	Shanks, Royal	Hardin
Klingler, Donna	Hardin	Scott, Owen	Hardin
Klinger, Ruby	Paulding	Stemen, Gladys	Van Wert
Long, Russell	Hardin	Stemen, Reba	Van Wert
Lonas, Dora	Stark	Sterritt, Voldren	Morrow
Loman, Mildred	Hardin	Stryker, Margaret	Somerset, N. J.
Landon, Lee Erma	Hardin	Smull, Miriam May	Hardin
Leslie, Verda	Hardin	Scott, Izora	Hardin
Lowe, Ruth	Hardin	Slack, Helen	Hardin
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Miller, Herman L.	Marion	Speer, Mildred	Hardin
Moreland, L. S.	Washington, D. C.	Smith, Frankie	Hardin
Miller, Hubert	Hardin	Sheley, Mary Ellen	Van Wert
McGinnis, Mildred	Hardin	Stauffer, Helen	Hardin
McWilliams, Wava	Hardin	Stamm, Opal	Knox
Matteson, Ellen	Wyandot	Turner, Betty Jane	Hardin
Meister, Ethel	Belmont	Welday, H. S.	Jefferson
McElroy, Cleola	Hardin	Welker, R. L.	Hardin
McElroy, Mozelle	Hardin	Warner, Richard	Hardin
Main, Mildred	Hardin	Whitworth, Eleanor	Hardin
Main, Pauline	Hardin	Wood, Grace Anna	Hardin
Miller, Delight	Hardin	Whitworth, Dorothy	Hardin
Moorman, Dorothy	Hardin	Wilson, Ruth	Hardin
McCurdy, Flora	Hardin	Walker, Mrs. G. C.	Hardin
McLaughlin, Mary	Hardin	Wilcox, Mildred	Franklin, N. Y.
McElroy, Mrs. Lloyd	Hardin	Williams, Oliver	Paulding
Mohler, Kathleen	Hardin	Warren, Millicent	Hardin

Witham, Mary	Hardin	Young, Lynn	Hardin
Witham, Carrie	Hardin	Young, Mary	Hardin

EXPRESSION

Branam, Reta	Paulding	Marshall, Glenna	Hardin
Case, Charles	Licking	Matteson, Ellen	Wyandot
Campbell, Ada	Hardin	Moorman, Dorothy	Hardin
Davison, Ada	Hardin	Mustard, Ruth	Hardin
Dehus, Delores	Ross	McCurdy, Trola	Hardin
Davenport, Gladys	Hardin	Marshall, Opal	Hardin
Dickson, Grace	Hardin	Murphy, Faye	Pike
Eibling, Elbert	Hardin	Noaker, H. M.	Stark
Evans, Viola	Van Wert	Northup, Verona	Hardin
Gallapoo, Ralph	Hardin	Nickles, Juanita	Tuscarawas
Gallant, Ruth	Hardin	Page, Warder	Champaign
Hoel, Charles	Paulding	Poe, Leah	Hardin
Hord, Milton	Marion	Povenmire, Katherine	Hardin
Harrold, Raymond		Rumbaugh, Margaret	Hardin
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Liechti, Walter	Washington, Pa.		

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Maxwell, Paul	Miami	Waterman, Charles	Hancock
Owens, J. Glen	Allen		

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Strutt, Elgie F.	Stark	Whiteside, Franklin	Union
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Thompson, W. C.	Mahoning	Zoll, Wilbur	Clark
Tritschler, Leo C.	Beaver, Pa.		

FEDERAL STUDENTS

Allinger, Neil J.	(Engineering)	Allen
Alspaugh, J. W.	(Engineering)	Allen
Baldwin, E. H.	(Pharmacy)	Allen
Barnes, Jean C.	(Engineering)	Hardin
Barney, E. E.	(Engineering)	Colombia, S. A.
Bow, Homer	(Special)	Stark
Brown, Kenneth	(Law)	Franklin
Brown, J. F.	(Special)	Allen
Burns, Granville	(Education)	Belmont
Caffee, H. G.	(Engineering)	Richland
Capell, Paul R.	(Engineering)	Hardin
Carpenter, Dale	(Engineering)	Fulton
Carver, Earl L.	(Engineering)	Lucas
Clevenger, Alfred L.	(Engineering)	Allen
Clymer, Gale L.	(Engineering)	Hancock
Collier, James	(Law)	Lawrence
Conaway, Charles	(Special)	Morrow
Cookingham, M. D.	(Structural)	Allen
Coppersmith, W. D.	(Engineering)	Allen
Cussen, Paul	(Education)	Paulding
Denius, Harry G.	(Education)	Lorain
Farnsworth, H. D.	(Engineering)	Trumbull
Fillman, Walter	(Law)	Lucas
Fryer, Phae N.	(Pharmacy)	Kings, N. Y.
Fullerton, H. H.	(Structural)	Allen
Garner, Edison	(Engineering)	Jefferson
German, W. F.	(Special)	Monroe, N. Y.
Geyer, Cleo Geo.	(Special)	Putnam
Gooch, Charles	(Law)	Henry, Mo.
Grunau, George	(Engineering)	Cuyahoga
Guillinger, B. E.	(Law)	Mahoning
Gwinner, R. M.	(Commerce)	Crawford

FEDERAL STUDENTS

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Halter, Gale	(Engineering)	Allen
Harris, Wm. P.	(Special)	Erie
Horst Clarence	(Engineering)	Wayne
Houff, Joseph	(Special Engineering)	Lorain
Kennedy, Eugene	(Engineering)	Richland
Kinery, George	(Law)	Lawrence
Kingsbury, W. S.	(Special)	Logan
Kramer, L. F.	(Engineering)	Allen
Lindersmith, Paul	(Special)	Williams
McConnell, G. D.	(Engineering)	Tuscarawas
McKeever, D. D.	(Special)	Crawford
Meyer, Howard M.	(Religion)	Stark
Miller, Harold F.	(Law)	Lucas
Miller, John F.	(Special)	Bergen, N. J.
Mosbacher, Matt J.	(Law)	Crawford
McElroy, Harry	(Commerce)	Hardin
Nichols, Robert	(Law)	Richland
Nichols, Russel	(Special)	Richland
Oswald, Frederick	(Special)	Randolph, Ind.
Patterson, Charles A.	(Law)	Hardin
Perkinson, W. D.	(Special)	Scioto
Pugh, M. G.	(Engineering)	Miami
Raifsnnyder, Frank	(Engineering)	Crawford
Reaney, Wm. A.	(Special)	Hardin
Richardson, Howard	(Pharmacy)	Allen
Ring, Joseph	(Engineering)	Allen
Robinson, B. C.	(Law)	Cuyahoga
Schaeublin, L. F.	(Law)	Pickaway
Sawyer, J. V.	(Special)	Allen
Schlegel, Paul	(Law)	Richland
Snider, S. R.	(Special)	Cuyahoga
Sowash, H. A.	(Law)	Richland
Stich, F. A.	(Engineering)	Hamilton
Stearns, C. L.	(Special)	Morrow
Stinebaugh, Melvin	(Engineering)	Auglaize
Stettler, Paul	(Pre-Commerce)	Allen
Sukup, I. A.	(Special)	Crawford
Swindler, B. W.	(Engineering)	Paulding
Thobaben, W. H.	(Engineering)	Cuyahoga
Thompson, Paul	(Engineering)	Hardin
Thompson, P. E.	(Law)	Hardin
Turner, W. F.	(Law)	Stark
Upp, Arthur	(Engineering)	Williams
Walker, Grover C.	(Liberal Arts)	Auglaize
Welday, Clayton E.	(Special)	Cuyahoga
Wickman, Roy C.	(Commerce)	Seneca
Woolever, A. E.	(Special)	Lake

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